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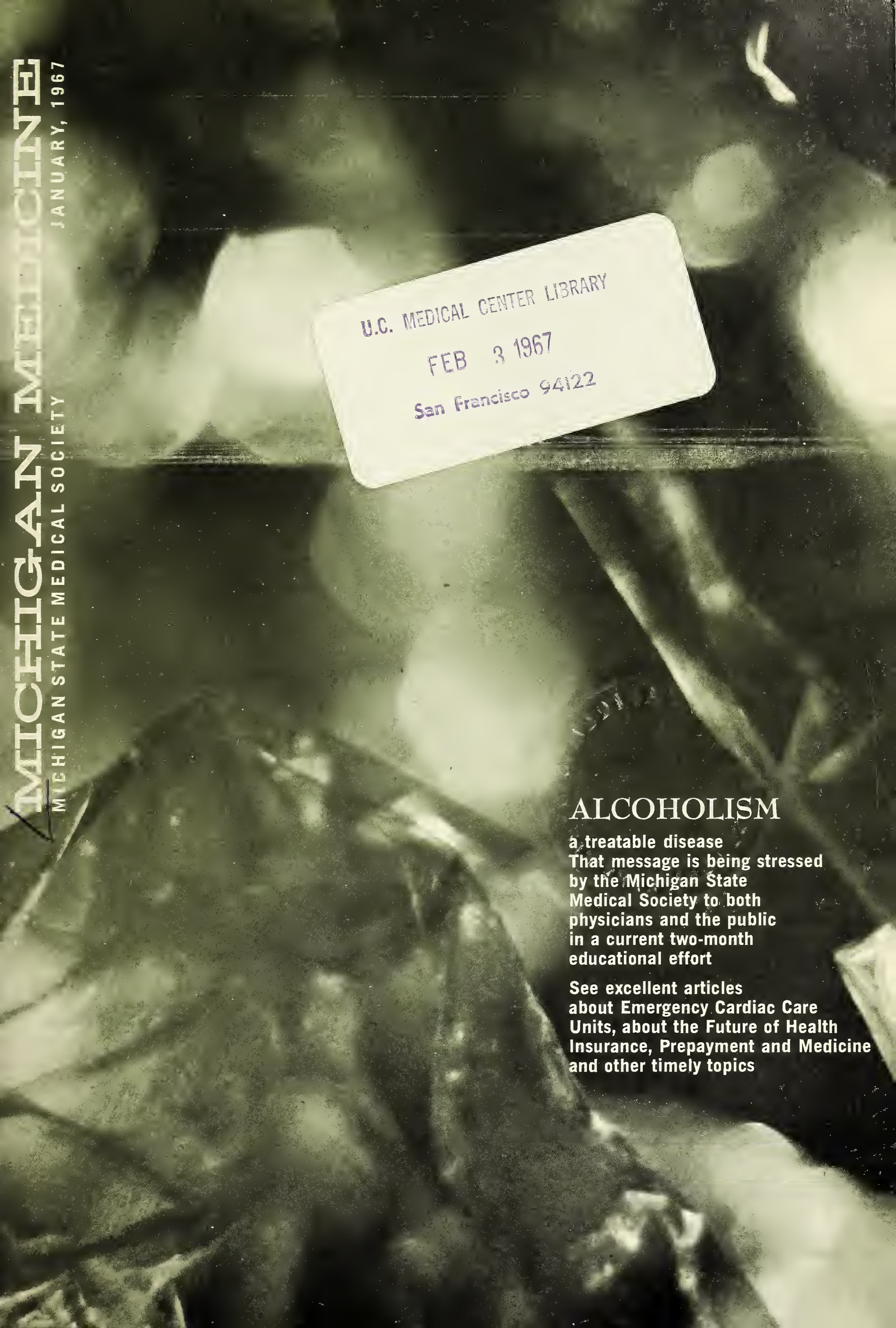

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MICHIGAN STATE MEDICAL SOCIETY
JANUARY, 1967

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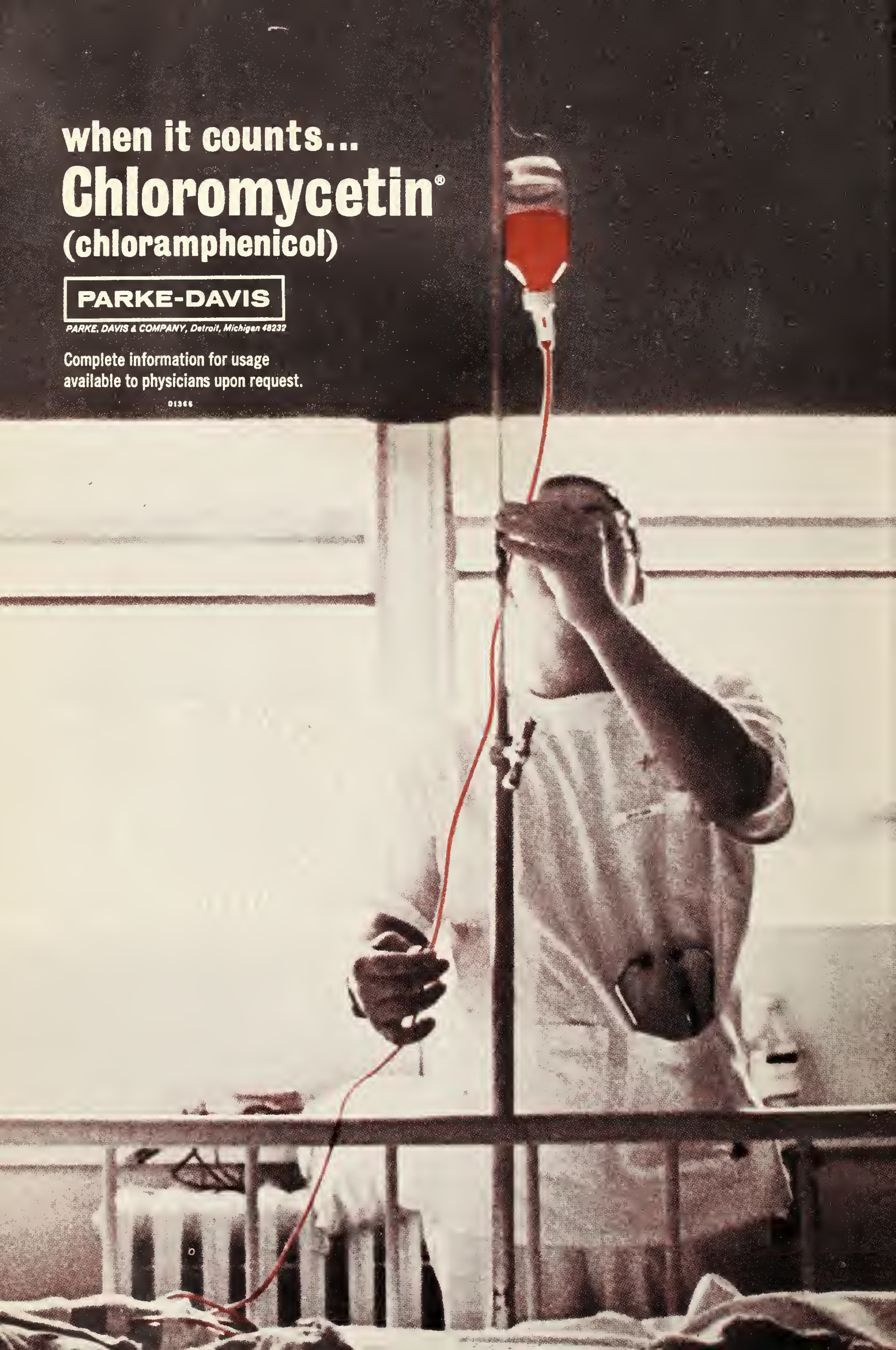

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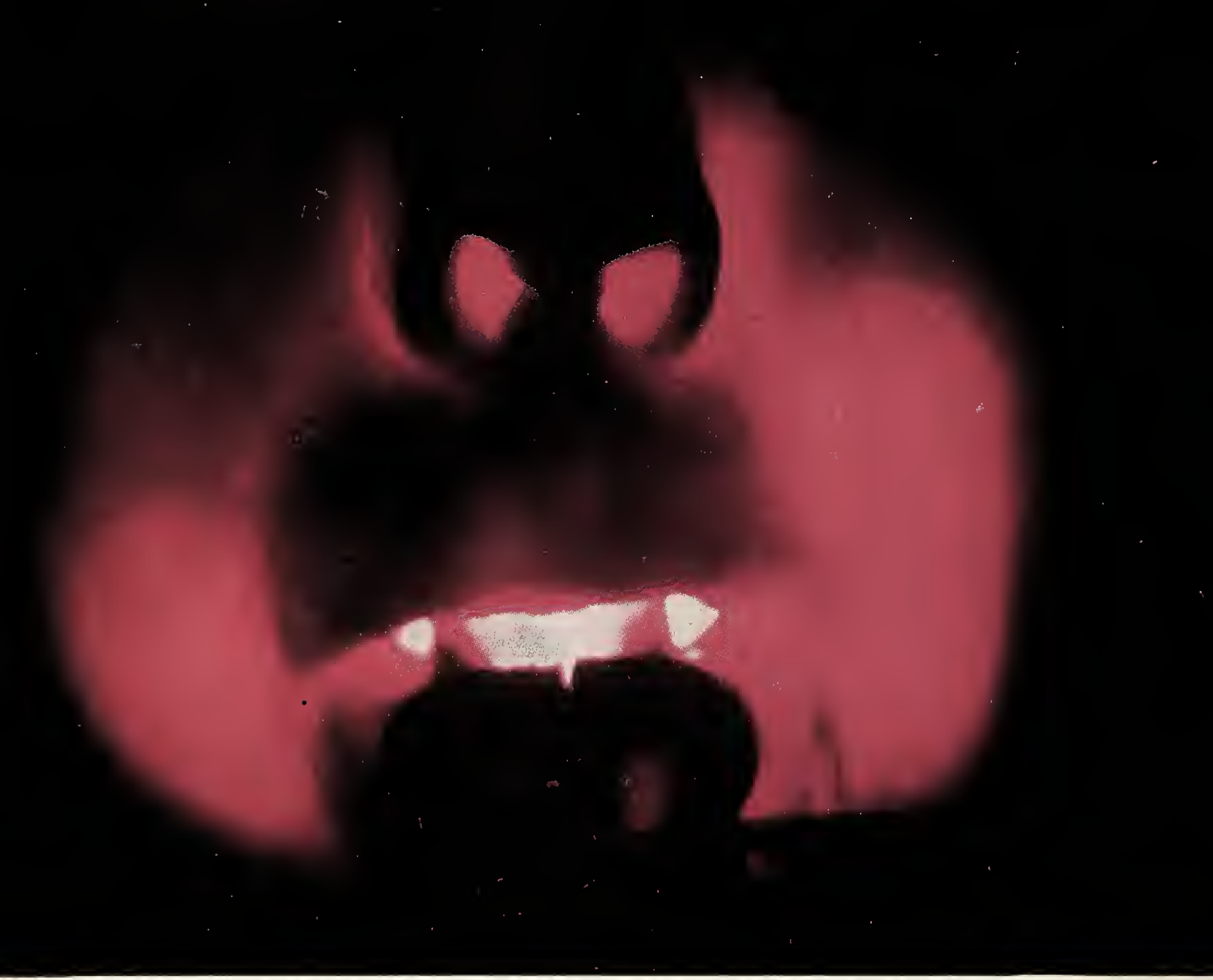

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MICHIGAN MEDICINE

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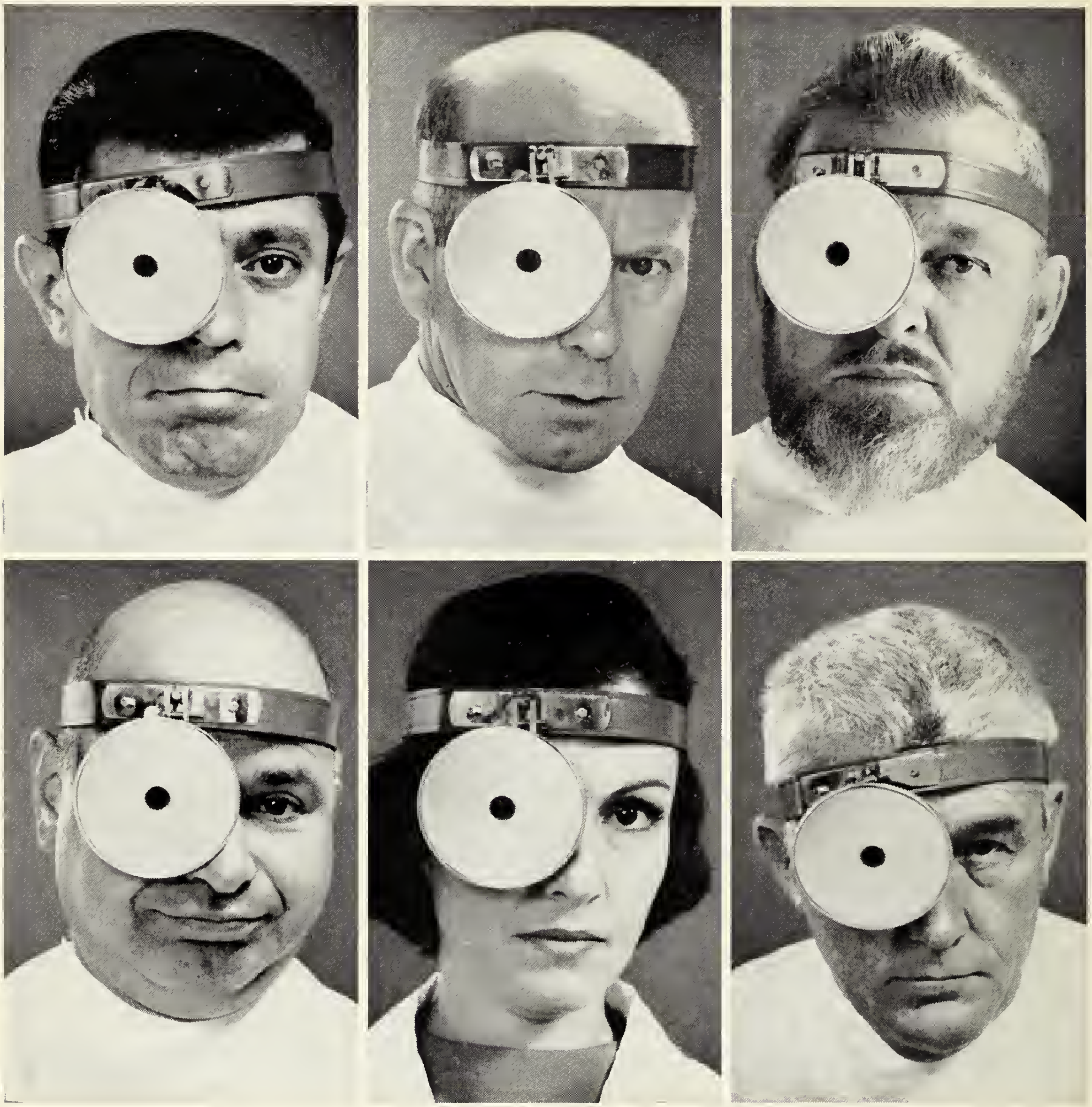

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Just look at them and you can see how much they have in common. Besides, they all go through pretty much the same training, and pass the same kinds of tests, and measure up to the same sort of standards. Therefore, all otolaryngologists are alike. Right?

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FOR
CHILDREN

president's message

The increasing complexity of our society has presented both the individual physician and organized medicine with new problems of staggering proportions.

The solution to these problems cannot possibly be accomplished by physicians alone, either as individuals or in organized groups.

We must take advantage of every opportunity of liaison and cooperation with organizations having similar aims and objectives. There are two organizations in Michigan closely allied to MSMS whose potential is not fully realized simply because we take them for granted or in some instances ignore them in varying degrees.

The Woman's Auxiliary to the Michigan State Medical Society has a long and significant history of usefulness in advancing various community, state and national projects related to health.

Time and space does not permit enumeration of their many accomplishments but outstanding in this respect are their long time promotion of health career recruitment, their continuing activities on behalf of AMA-ERF and their recent very signifiicant contributions to the great success of MSMS's pioneering Healthmobile. These dedicated women are capable of doing much more in the interest of better health care and the improvement of community life.

I would like that officers and committee chairmen of all county medical societies consider ways and means of further improving effective communication and cooperation with the local county auxiliaries and the state auxiliary. I am quite sure that these ladies will be most appreciative of information about the many problems facing organized medicine, and such knowledge will make them more effective in discussing and molding opinions which will lead to the solution of these problems.

Since the membership of the state auxiliary is about half of that of MSMS it is important for all physicians to encourage their wives to become affiliated with and actively support their county and state auxiliary.

The Michigan State Medical Assistants Society is a somewhat younger organization but also made significant contributions to the improvement of health care in Michigan.

Their membership of 875 is only a small fraction of the potential of this organization. Here again encouragement by each physician for his assistants to become affiliated with the local and state groups is one way to realize the full potential of this organization which is so closely related to the care of your patients. I am sure that the officers and members of MSMS will appreciate information and guidance as to how they can be of more help in promoting better health care in Michigan.

Thanks is due both of these organizations for their past interest and accomplishments on behalf of better health care. The officers and membership of both groups are awaiting our guidance and suggestions for becoming even more useful, each in their own unique way, in promoting better health care.

It is up to us as individual physicians and organized groups to encourage, inform and otherwise become more closely associated with these important allied groups.

C. Allen Payne MD

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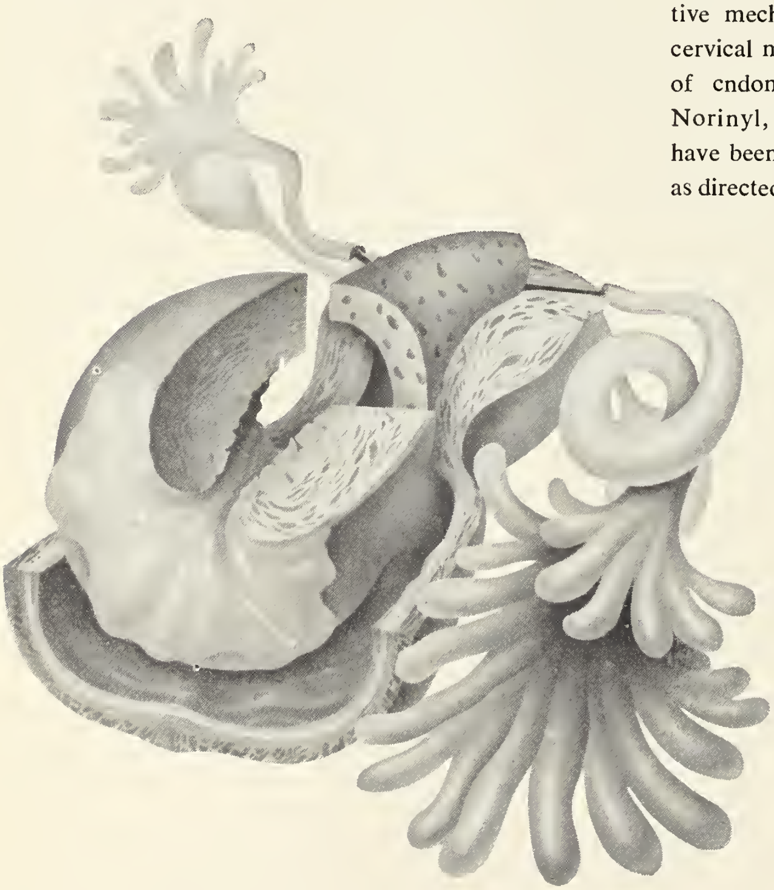

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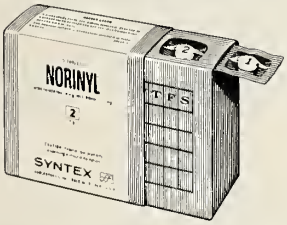

Contraindications: Thrombophlebitis or pulmonary embolism (current or past). Existing evidence does not support a causal relationship between use of Norinyl and development of thromboembolism. While a study which was conducted does not resolve definitively the possible etiologic relationship between progestational agents and intravascular clotting, it tends to confirm the findings of the Ad Hoc Advisory Committee appointed by the Food and Drug Administration to review this possibility. Cardiac, renal or hepatic dysfunction. Carcinoma of the breast or genital tract. Patients with a history of psychic depression should be carefully studied and the drug discontinued if depression recurs to marked degree. Patients with a history of cerebral vascular accident.
Warning: Discontinue medication pending examination if there is sudden partial or complete loss of vision, or if there is a sudden onset of proptosis, diplopia or migraine. If examination reveals papilledema or retinal vascular lesions, medication should be withdrawn.
Precautions: By May 1963, experience with norethindrone 2 mg.—mestranol 0.1 mg. had extended over 24 months. Through miscalculation, omission or error in taking the recommended dosage of Norinyl, pregnancy may result. If regular menses fail to appear and treatment schedule has not been adhered to, or if patient misses two menstrual periods, possibility of pregnancy should be resolved before resuming Norinyl. If pregnancy is established, Norinyl should be discontinued during period of gestation since virilization of the female fetus has been reported with oral use of progestational agents or estrogen. When lactation is desired, withhold Norinyl until nursing needs are established. Existing uterine fibroids may increase in size. In metabolic or endocrine disorders, careful clinical preevaluation is indicated. A few patients without evidence of hyperthyroidism had elevated serum protein-bound iodine levels, which in the light of present knowledge, does not necessarily imply hyperthyroidism. Protein-bound iodine increased following estrogen administration. Bromsulphalein retention has occurred in up to 25% of patients without evidence of hepatic dysfunction. Studies from 24-hour urine collections have shown an increase in aldosterone and 17-ketosteroids and decrease in 17-hydroxycorticoid levels. Thus, Norinyl should be discontinued prior to and during thyroid, liver or adrenal function tests. Because progestational agents may cause fluid retention, conditions such as epilepsy, migraine and asthma require careful observation. Thus far no deleterious effect on pituitary, ovarian or adrenal function has been noted; however, long-range possible effect on these and other organs must await more prolonged observation. Norinyl should be used with caution in patients with bone, renal or any disease involving calcium or phosphorus metabolism.
Side Effects: Intermenstrual bleeding; amenorrhea; symptoms resembling early pregnancy, such as nausea, breast engorgement or enlargement, chloasma and minor degree of fluid retention (if these should occur and patient has not strictly adhered to medication plan, she should be tested for pregnancy); weight gain; subjective complaints such as headache, dizziness, nervousness, irritability; in a few patients libido was increased. In a total of 3,090 patients, 2.2% discontinued medication because of nausea.
NOTE: See sections on contraindications and precautions for possible side effects on other organ systems.
Dosage and Administration: One Norinyl tablet orally for 20 days, commencing on day 5 through and including day 24 of the menstrual cycle. (Day 1 is the first day of menstrual bleeding.)
Availability: Dispensers of 20 and 60 tablets; bottles of 100.

References: 1. Council on Drugs. JAMA 187:664 (Feb. 29) 1964. 2. Bryans, F. E.: Canad Med Ass J 92:287 (Feb. 6) 1965. 3. Goldzieher, J. W.: Med Clin N Amer 48:529 (Mar.) 1964. 4. Cohen, M. R.: Paper presented at Symposium on Low-Dosage Oral Contraception, Palo Alto, Calif., July 15, 1965. Reported in Med Sci 16:26 (Nov.) 1965. 5. Hammond, D. O.: Ibid. 6. Rice-Wray, E., Goldzieher, J. W., and Aranda-Rosell, A.: Fertil Steril 14:402 (Jul.-Aug.) 1963. 7. Goldzieher, J. W., Moses, L. E., and Ellis, L. T.: JAMA 180:359 (May 5) 1962. 8. Kempers, R. D.: GP 29:88 (Jan.) 1964 9. Tyler, E. T.: JAMA 187:562 (Feb. 22) 1964. 10. Rudel, H. W., Martinez-Manautou, J., and Maqueo-Topete, M.: Fertil Steril 16:158 (Mar.-Apr.) 1965. 11. Flowers, C. E., Jr.: N Carolina Med J 25:139 (Apr.) 1964. 12. Goldzieher, J. W.: Appl Ther 6:503 (June) 1964. 13. The Control of Fertility. Report adopted by the Committee on Human Reproduction of the American Medical Association. JAMA 194:462 (Oct. 25) 1965. 14. Flowers, C. E., Jr.: JAMA 188:1115 (June 29) 1964. 15. Merritt, R. I.: Appl Ther 6:427 (May) 1964. 16. Newland, D. O.: Paper presented at Symposium on Low-Dosage Oral Contraception, Palo Alto, Calif., July 15, 1965. Reported in Med Sci 16:26 (Nov.) 1965.

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Editor:

Enclosed is a copy of an article appearing in the Ingham County Medical Society Bulletin of November, 1966. It expresses a few ideas that I would very much like to share with the members of the Michigan State Medical Society as well.

Politics will probably always be a part of medical organizations. Yet, it is inconceivable that any individual or group would put their own political fortunes above the good of the medical profession.

In looking back at some of the deliberations of the 1966 House of Delegates, there's a question whether or not a political blackjack was used by a Reference Committee to show The Council of the Michigan State Medical Society — and the Society itself — who is boss.

The liveliest debate of the session occurred when the House considered the newly issued Hospital Utilization Review manual. The Reference Committee on Reports of The Council acknowledged that the Committee on Evaluation of Prepaid Medical Services had made some effort in following the direction requested by the House of Delegates in 1964 and 1965. Then the Reference Committee took issue with what had been done on the problem of utilization and delivered a series of blunt directives, which it felt would at least ameliorate some of the harmful effects of the work of the Committee on Evaluation of Prepaid Medical Services.

From the tone of the report of the Reference Committee and from the tone of some of the discussion on the floor, one had no doubt that a firm rebuke had been administered to the Committee on Evaluation of Prepaid Medical Services; i particular to Beverly C. Payne, MD, Ann Arbo its Chairman; to The Council and to any othe potential deviationist.

In the end, the report of the Reference Con mittee was adopted by a weak voice vote of th House.

My purpose in bringing up this matter at all to discuss the results of this action. My principa concern is not so much what was done — but ho emphatically it was done. I wonder seriousl whether the House of Delegates hasn't done ou cause more harm than good.

MERITS OF THE CASE

Let's look at the merits of the case objectivel Everyone involved no doubt felt he was doin the right thing.

In 1965, the House of Delegates approved a pla of implementation recommended by the Con mittee on the Evaluation of Prepaid Medical Services. The House certainly gave Doctor Payne an his Committee wide scope and also rather specifi instructions to tackle the areas they did face up t The Committee worked hard and enthusiasticall It turned out an extensive piece of work that ou lined the ideal in medical practice.

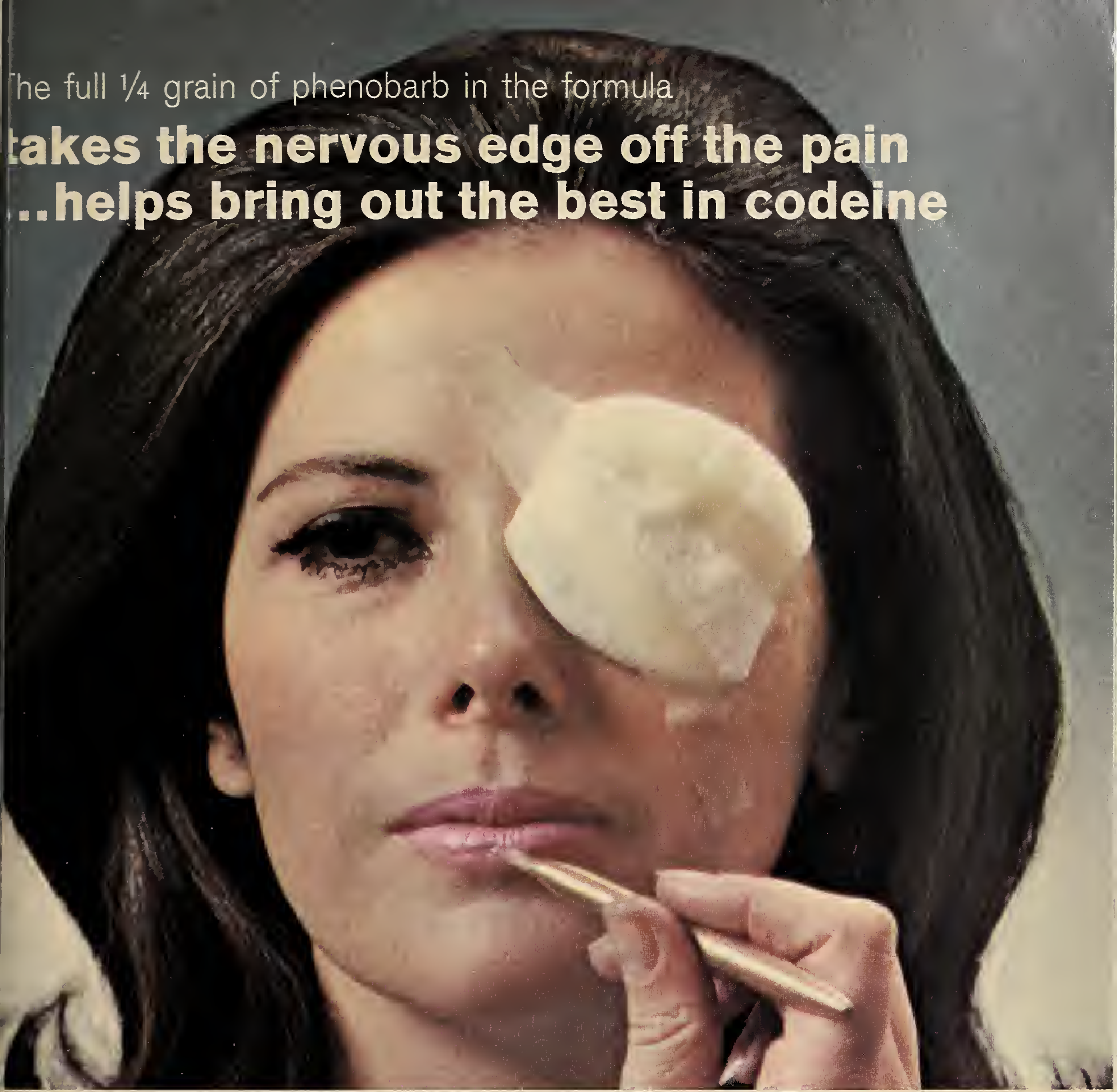
The Council was anxious to offer professiona guidance for the hospitals of Michigan rather tha allowing governmental agencies to issue criteri on utilization of their own. The Councilors fel they were under pressure to meet the deadline o Medicare and released the Hospital Utilizatio manual as a guideline — rather than strict criteri to be followed rigidly under all circumstances.

On the other hand, the Reference Committe was of the opinion that the Manual gave the impression of cookbook medicine. Its members objected to the fact that the Manual was given wid distribution without testing its reaction on limited scale first.

During the Delegates' discussion, the enthusias of Doctor Payne's Committee and The Counci was described as a football player who made touchdown and kept on running out of the stadium. I think this is quite appropriate. I think th analogy can be carried even further to describ the actions of the Reference Committee and th House as a defensive team that caught the bal carrier behind the goal line and then pushed hi right out of the ball park.

Certainly Doctor Payne's Committee didn't com up with a monster which would never have com to life if they had only left it buried. Certainl The Council of this State Society isn't a den o

(Continued on Page 13)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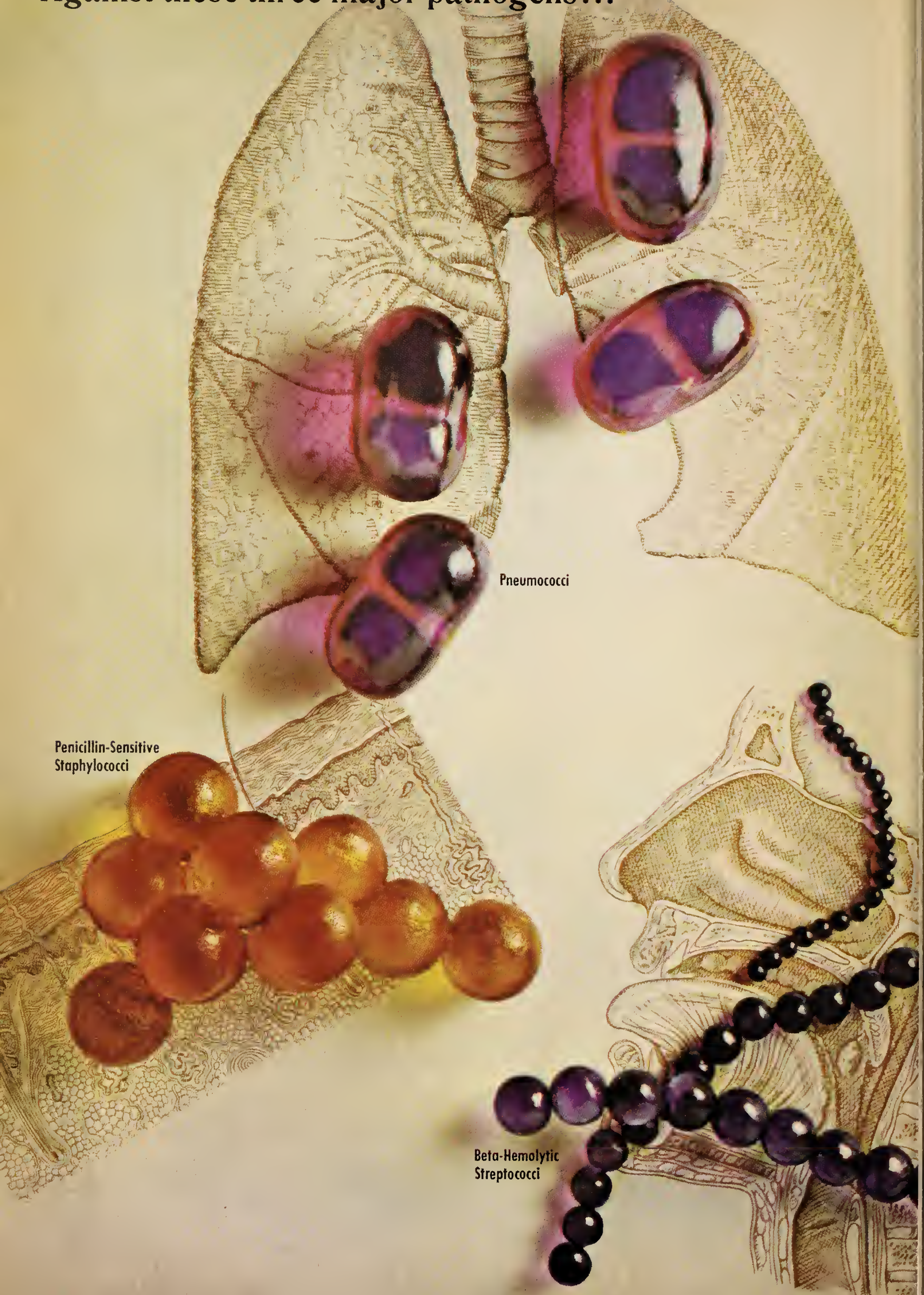
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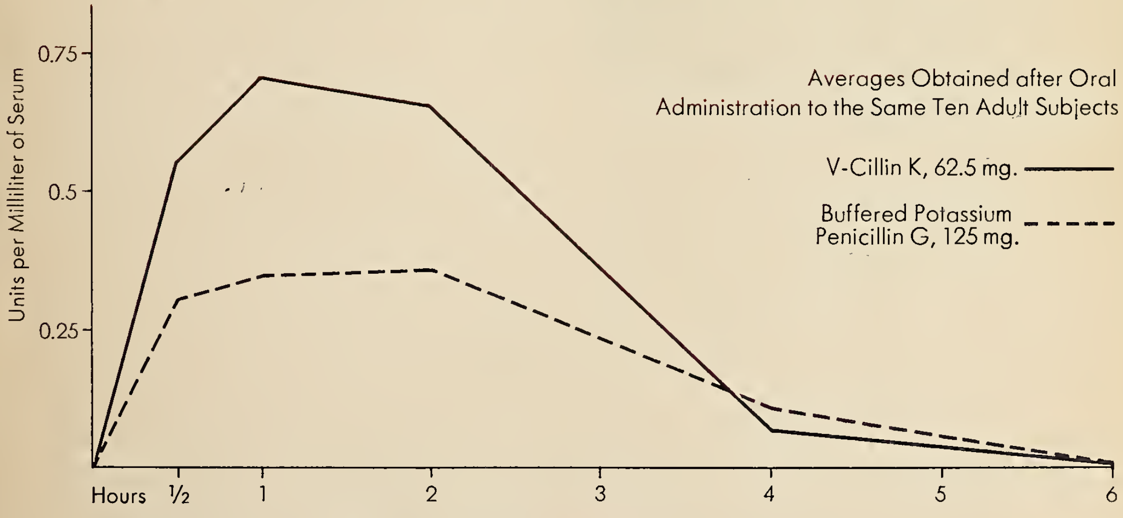
Penicillin G	0.02	0.005-1.6	0.005	0.002-0.2	0.02	0.01-0.1
Methicillin	1.6	0.4-6.3	0.2	0.1-0.4	0.2	0.1-1.6
Oxacillin	0.4	0.1-3.1	0.04	0.02-0.4	0.1	0.04-0.8
Cloxacillin	0.2	0.2-0.8	0.1	0.1-0.8	—	—
Nafcillin	0.4	0.2-0.8	0.04	0.02-0.1	0.02	0.02-0.2
Ampicillin	0.2	0.1-0.8	0.02	0.01-0.04	0.02	0.01-0.04

Adapted from Klein, J. O., and Finland, M.: New England J. Med., 269:1019, 1963.

with high blood levels, even in the presence of food



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V-Cillin K, Pediatric, is an oral solution of clinically proved V-Cillin K in teaspoon dosage form. When mixed as directed, each 5 cc. (approximately one teaspoonful) will contain 125 mg. (200,000 units) phenoxymethyl penicillin as the potassium salt.

Indications: V-Cillin K has been shown to be effective in the treatment of streptococcus, pneumococcus, and gonococcus infections as well as infections caused by sensitive strains of staphylococci. It may be used for the prophylaxis of streptococcus infections in patients with a history of rheumatic fever and for the prevention of bacterial endocarditis after tonsillectomy and tooth extraction in those patients with a history of rheumatic fever or congenital heart disease.

Contraindication: V-Cillin K should not be administered to a patient with a history of penicillin hypersensitivity.

Precautions: V-Cillin K should be used cautiously, if at all, in a patient with a strongly positive history of allergy. Reactions occur more frequently in individuals with bronchial asthma or other allergies or in those who have previously demonstrated sensitivity to penicillin; hypersensitivity reactions occur, the drug should be discontinued.

Adverse Reactions: Although serious allergic reactions are m less common with administration of oral penicillin than with intramus lar forms, skin rash, symptoms resembling those of serum sickness other manifestations of penicillin allergy may occur. When penicilli administered, measures for treating anaphylaxis should be rea available. Those include epinephrine, oxygen, and pressor drugs relief of immediate allergic manifestations as well as antihistami and corticosteroids for delayed effects.

The use of antimicrobial agents may be associated with the o growth of antibiotic-resistant organisms; in such a case, antibiotic ministration should be stopped and appropriate measures taken.

Administration and Dosage: For Tablets V-Cillin K and for V-C K, Pediatric, the usual dosage ranges from 125 mg. (200,000 un three times a day to 500 mg. (800,000 units) every four hours. For fants, the daily dosage may be 50 mg. per Kg. of body weight divi into three doses.

Beta-hemolytic streptococcus infections without associated ba remia may be treated with 200,000 to 400,000 units three times a c Therapy should be continued for a minimum of ten days to prevent velopment of rheumatic fever and/or other serious complications. D age for routine streptococcus prophylaxis in patients with a history rheumatic fever or congenital heart disease may be 200,000 units a or twice daily. When such patients undergo tonsillectomy, tooth ext tion, or other minor surgery, the prophylactic dose should be 500, units every six hours given two days prior to surgery and for two d postoperatively. If oral medication is not feasible on the day of gery, parenteral therapy should be considered. Mild to modera severe pneumococcus pneumonia has been treated effectively v 250 mg. every six hours.

In staphylococcus infections, 400,000 units or more should be gi every six to eight hours in conjunction with indicated surgical pro dures.

For gonorrhea in males, 500 mg. (800,000 units) every six hours three doses may be employed; in females, 500 mg. every four hours six doses are recommended. Patients with a suspected lesion of syph should have a dark-field examination before receiving penicillin monthly serologic tests for a minimum of three months.

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iberals seeking to sabotage the practice of medicine as we have known it for some time.

It seems to me that with a little restraint on everyone's part, we could have profited from this venture. As it is now everybody loses. Unfortunately the big losers in this situation may well be the practicing physicians.

LEADERSHIP

Why are we practicing physicians the losers? Because of what it does to our leadership. There are approximately 300,000 physicians in this country, out of approximately 190 million people. For the past 25 years, we have been searching continuously for some secret formula or magic potion that would convince these vast numbers of people to see things our way and follow us. Since Medicare is now law, with not only Title XVIII but Title XIX as well, we have not been 100% successful.

If we are to have effective leadership in our present-day society, we must make room in our ranks for men who are able and willing to find new approaches to satisfy the demands of society, and yet fit our requirements for high quality medical care. In any group, those that stand out from the herd are not only the greatest source of problems but also the ones who offer the greatest chance for outstanding success.

In doing surgery of a routine nature, one expects a minimum morbidity and mortality. If one is to be a bit more daring and do more experimental type surgery, one has to accept a higher morbidity and mortality. So it is in the socioeconomic side of medicine. If we attempt something new and different and it doesn't come off perfectly, this is no reason to castigate the people involved. Certainly suggestions for rectifying the situation are justified. This is in the family, however, and brass knuckles don't seem indicated.

Creativity Paralyzed

It is obvious that any creative thinking on the part of The Council will now be paralyzed for some time. The Council and its Committees may be afraid to make significant decisions until cleared by the House of Delegates at a time when things are really happening fast in the outside world.

After considering the action of the 1966 House of Delegates, it is entirely possible that any member may hesitate to take the responsibilities of carrying on the many important activities of the Society requiring dedicated service.

This whole episode has a deleterious effect on the usefulness of the Michigan State Medical Society when it is necessary that it be active, strong and flexible. By our action, we may have stifled the initiative of our leaders during the coming year — and discouraged those men, who are capable and willing to work hard to produce ideas that are different or imaginative.

This leaves us in our customary role; all the ideas and leadership for social change must come from the outside. The Michigan State Medical Society then becomes the Essence of Nothing.

D. Bonta Hiscoe, M.D.,
Lansing

It was very kind of you to send me copies of your attractive and thought-provoking booklet, "The American Economic Scene at Mid-Century," of reprints of your journal articles by Professor Hardwick.

There is a need to present the free-enterprise approach. In fact, our Information Central just recently started a new file of background material titled, "Free Enterprise." So your contribution is both welcome and timely.

Let me take you up on your kind offer and ask you to send a few more booklets.

James P. Low
Executive Vice President
American Society of Association
Executives
Washington, D.C.

Your October cover about VD Education for *Michigan Medicine* certainly turned out extremely well. The olive tone seemed to be the perfect color choice.

We would greatly appreciate it if you would send us a couple of copies for possible use in a story.

You are certainly doing a splendid job on the magazine. It's loaded with good copy.

Oren W. (Bud) Wright
Assistant Director
AMA Program Service

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Emergency Cardiac Care Units In Two Community Hospitals

BY M. K. DOLBEE, M.D.
STANDISH

In the past few years, there has been great interest in the development of coronary care units. This interest has been very intense both among the lay people as well as among physicians. Newspapers and magazines have published material detailing the activities of these units in various hospitals around the country, and knowledge of the existence of these lifesaving units is as well developed in the rural as in the urban areas.

This has created a desire for the availability of such units in the most rural area since the fear of "heart attack" strikes at everyone. These units have been most frequently developed in large urban hospitals or teaching centers. Of a necessity, this must be so since all of the research work in developing electronic monitoring equipment and the techniques of pacing and resuscitation have been researched in the cardio-vascular units of larger hospitals.

The greater majority of hospitals in this country are relatively small and of some distance geographically from the larger urban hospitals. In the northern half of Michigan, the small hospitals out-number the larger hospitals by six to one.

It follows, then, that the majority of cardiac patients will be seen first in a small hospital. Because of the geographical distance involved, the majority of cardiac patients will be denied the use of the large hospital coronary care unit.

At the same time, the nature of their illness either coronary occlusion, severe failure, or arrhythmia, makes transportation of any great distance a hazard. If the patient cannot be moved to the coronary care unit, then the coronary care unit must be brought to the patient even if he lies in a small community hospital.

REALIZING THESE circumstances, the author, a general practitioner in a small hospital, became interested in the feasibility of developing a small hospital cardiac care unit, and translating the large hospital experience into a workable program that could be used in our small community hospitals.

In any discussion of a cardiac care unit in the small community hospital, the lack of a house staff is generally cited as a chief deterrent toward its development. This is undoubtedly true. The lack of a house staff does make the establishment of this unit more difficult. As a practitioner in a small non-staffed hospital, it seemed to me that the electronic monitoring of cardiac patients, developed in the large teaching hospitals represented the first break-through in modern technology that was desirable and useful to us.

In our hospital, the nurse to a large extent fulfills the function of the intern and the resident of the larger hospital. Without dwelling on the merits of this particular situation, reality insists that we recognize this to be true. It follows then that any modality that will enable these nurses to render more care or better care should be utilized.

WHEN I BEGAN this project of developing a cardiac care unit in a small hospital, it was my impression that dedicated nurses could be trained to carry out many of the functions we now assign to ourselves. As the project progressed, I have been gratified at the response on the part of the nurses. These women have been very happy to have their ability recognized, and responsibility given to them to function as professional people rather than simply doing a lot of charting work.

We realized that the translation of the experience of the large hospital into practical use of the small hospital would require considerable adaptation. To determine the feasibility of such a unit the following questions were set up:

1. Could nurses be trained to operate the cardiac care unit, not only in day-to-day routine, but also to recognize and respond to the emergency situations?
2. Would bringing all cardiac patients into one area allow better care, or create more anxiety among cardiac patients?
3. Would the average generalist become familiar with the equipment and routines and utilize them?
4. Could the over-all cost be kept within a reasonable limit?
5. Is it possible to standardize or routinize the care of coronary patients?

TO FIND THE ANSWERS at minimal cost and risk to patients, a single Electrodyne unit was purchased, and training classes for our registered nurses and licensed practical nurses started. At the onset, we visualized a three months training program, however, the interest shown by the nurses has been so intense that the scope of the program has been constantly widened, and is still being developed a year after inauguration. Classes started with 14 girls and we now have 26 attending faithfully.

The training programs are conducted an hour each week, and are held as a formal class. In addition, there has been an effort on the part of all physicians to instruct nurses individually in the wards in cardiac problems and cardiac care. We have used as a basic textbook the coronary care manual developed at Presbyterian Hospital in Philadelphia. We began by teaching basic anatom and physiology of the heart and circulatory system. We progressed to the development and treatmen of the various types of shock and the early recognition of congestive failure. Basic electrocardiography is taught with emphasis placed on the recognition of the catastrophic arrhythmias and their treatment.

Since the success of the operation of this uni depended entirely on the capability and initiative of the nurse as the first line of treatment, it became very obvious that initiative coupled with knowledge was the prime requisite of the cardiac unit nurse. It is quite obvious that in the even of a major catastrophic arrhythmia, or stand-still, there will be no time to summon a physician from his office or even from some distance in the hospital.

Therefore, our instruction has been pointed toward the recognition of the existing condition and the independent action of the nurse. It became apparent that the nurse must learn to recognize a dangerous or potentially dangerous condition, and secondly, would have to develop the initiative and confidence to go ahead and treat this condition while awaiting the arrival of the physician. If the basic step-by-step instruction program is laid out and carefully followed, as in the manual of the Presbyterian Hospital, the recognition of major arrhythmias is not difficult to understand. The nurse can be readily taught to recognize the onset of premature ventricular contraction (PVCs), runs of ventricular tachycardia, and finally ventricular flutter or fibrillation.

IF THIS PROGRAM is carefully followed, the nurses understand the danger of such early warning signs and the possibility that they may progress to the serious catastrophic arrhythmias. We have, therefore, put a great deal of insistence on the recognition of the PVC and other minor arrhythmias and conduction defects. It has been much easier in our experience to avoid serious arrhythmias than to correct them after they have developed.

It has not been unusual to have the nurse in charge call the attending physician and inform him that his patient has developed many PVCs or runs of ventricular tachycardia, or even a nodal rhythm. Appropriate action at this level has been found to be very effective in our experience.

The training of our personnel also includes the actual defibrillation of patients. All of our elective defibrillations are carried out by the nurses themselves under the direction of the physician. She, thus, becomes familiar with the use of the equipment, confident in its eventual outcome, and in

Author
M. K. Dolbee, M.D.
Standish

e event that she is forced to defibrillate a paent on her own initiative she will proceed withut hesitation. There is no other way these paents can be salvaged in a small community hosital. It would be purely happenstance for a staff hysician to be in the right spot at the right time. ood survival statistics cannot depend on happenance.

NURSES ARE TAUGHT from the beginning hat all major ventricular arrhythmias will likely sult in death and that the probability of the phyician arriving in time to correct this major catasophe is extremely poor. After careful consideraion by the staff, and by the entire hospital board, resolution was passed authorizing nurses in our ospital to proceed in such an event on their own. he nurse in charge is responsible for the diagnois of the arrhythmia and each shift of duty nurses orms their own defibrillation team.

Thus, our teams know well in advance what ach member is expected to do in the event of a ajor emergency. It is my belief that it is far safer o allow these nurses to defibrillate the patients lectrically by counter-shock than to attempt to ive the anti-arrhythmic drugs intravenously. It is ur feeling that beyond all question the developent of the nursing staff is by far the most imortant part in the establishment of any cardiac are unit.

We feel very strongly that unless someone on he physician's staff is willing to undertake a four o six months training program for nurses, before he equipment is installed, there is very little point n going ahead with the expenditure of large sums f money for building and equipment.

WE DECIDED TO BUILD a three-bed unit in uch a manner that all three patients could be isualized by the duty nurse at all times. Immedately adjacent to the central nursing station a 12 x 30 foot room was constructed. A glass wall was used between the unit area and the nursing rea. A sound proof ceiling and air conditioning was installed. A system of sliding partitions was developed in such a manner that while each basic ubicle was approximately 10 feet wide, the partiion could be moved laterally on ceiling-hung racks to enlarge the area by three or four feet. This additional space is invaluable in the event f increased activity in that particular unit.

With this system we can instantly enlarge any ne of our three units by as much as four feet. The solid walls have also proven to be much more aluable than cloth curtains. Curtains fail to insulate each unit from its adjacent unit. Activity, oise, and commotion in one unit invariably arouses such anxiety in the adjacent unit that it is sometimes necessary to move the second patient completely out of the area to re-establish tranquility. The sliding partition proved to be an excellent answer and quite inexpensive.

We do not feel that air conditioning is a luxury, but rather that a comfortable temperature is a necessity for these very sick patients. We now use a small curtain across the end of the cubicle for temporary isolation during bathing and other procedures. Normally, this curtain is kept open and patients have not experienced any feeling of claustrophobia even though the units are only 10 feet wide. Every effort has been made to select materials that were easily kept clean, required little maintenance, and would aid in keeping the unit quiet.

INSOFAR AS MONITORING equipment is concerned, I am convinced that most of the equipment on the market today could be used. The chief reason we have used the particular equipment in our unit is the familiarity of nurses with this type of equipment. The nurses were trained with it and gained a feeling of confidence for the functioning of this unit. I feel any strange equipment, or mixture of equipment simply tends to confuse the personnel. We have, therefore, stayed with the same basic equipment that we used for nurses training.

The necessary equipment in such a unit consists of a monitoring device with an oscilloscope which displays a lead two ECG tracing and incorporates an automatic pace-maker. One such unit is mounted directly above each bed. The patients are left with the pacing electrodes in place

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EDITOR'S NOTE

The two papers by Doctors Dolbee and LeFevre demonstrate the ingenuity and perseverance of today's physicians toward the solution of manpower problems and technical advances.

In two relatively small hospitals the authors show that good care can be provided by well trained personnel who are dedicated to the care of patients. Both authors show that complicated techniques can be learned and applied by personnel who formerly had no experience with such equipment or its application.

Though there is some repetition in the two papers, it is felt that both deserve publication because of their merits and because they were submitted almost simultaneously.

—GEORGE H. LOWREY, M.D.,
SCIENTIFIC EDITOR

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routinely and a seven second delay set on all of the alarms.

With this equipment, we are able to deactivate the pacing mechanism, while leaving all in readiness, by simply moving one switch from "external pacing" to "internal pacing". This is used to eliminate the possibility of an accidental stimulation of the sleeping patient by a false alarm. This has been quite upsetting to a few of our patients who have experienced it. To initiate pacing in the event of a triggered alarm, the nurse simply switches the unit from "internal" to "external" position and pacing begins.

At the present time, I know of no other way of avoiding the occasional false alarms that do happen. Because our duty nurse is also responsible for our cardiac care unit, we have extended the audible and visual alarms of the unit to all areas of the hospital. These alarms are triggered by the unit at the bedside and can only be turned off at the patient's bedside. We have a slave console at the charting desk where the nurse usually sits. She has immediately under her vision a tracing of each patient, a rate monitor of each patient, and can see each patient directly. This is illustrated in the accompanying illustration (Fig. 1).

Our physicians have learned the technique of inserting a right ventricular intra-cardiac pacing catheter. We have purchased a portable pacing unit as well. A Stokes-Adams patient can then safely be moved by ambulance with the portable pacer to a large center for installation of the permanent intra-cardiac pacemaker.

MEDICATIONS IN THE unit are carried in a small chest of the type sold in any large hardware store. Emergency drugs, syringes and tourniquets are placed where they will be immediately available. Airways and laryngoscopes, cut-down sets are carried in other drawers. All of this is on a portable treatment cart. The defibrillating unit is mounted in the bottom of the cart. The use of the air way, oxygen and establishment of air exchange has been stressed many times since procedure of pacing a heart without adequate oxygen is of very little use.

The other equipment in the unit is kept at a bare minimum to avoid clutter. A stethoscope hangs on each bed. There is a blood pressure cuff in a basket at the head of each bed. The bed, itself, supports an intravenous stand.

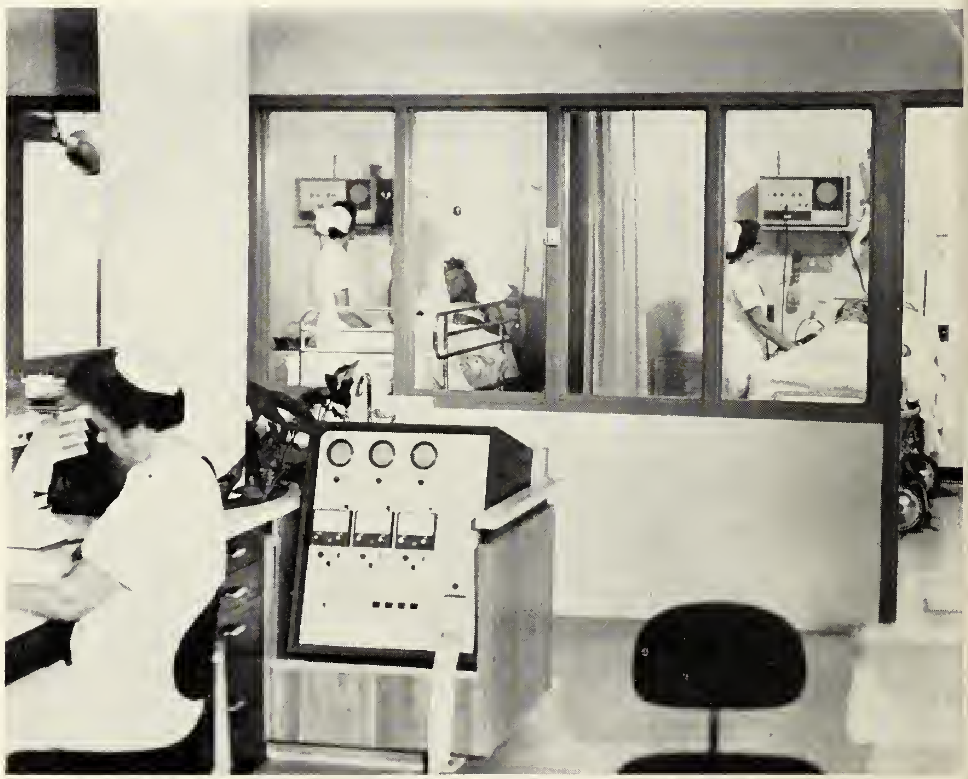


FIGURE 1: View from the nursing station showing some of the monitoring equipment and patient units.

The chief objective in translating the experience f a larger hospital research unit into the practial small hospital cardiac care unit has been to deelop a program which will be compatible with a mall hospital's assets, and will render the type of are that is needed to improve the coronary moridity statistics.

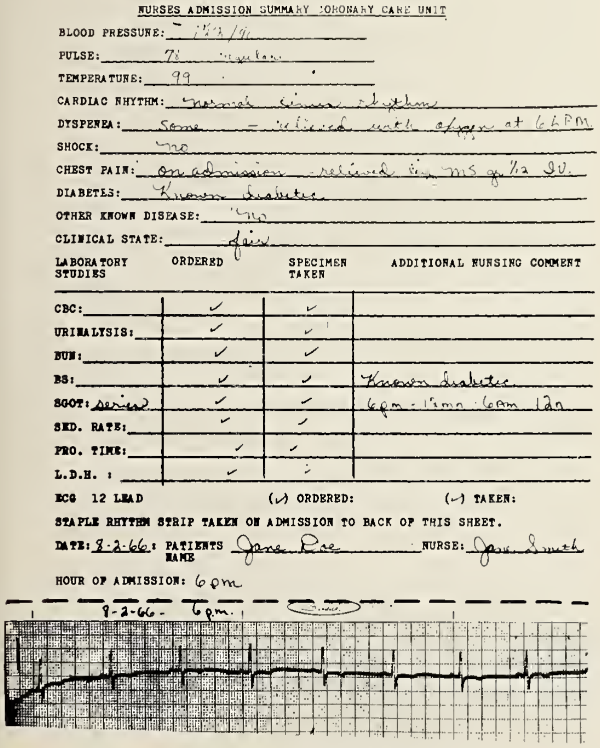
We have tried to develop a routine of admission nd care. In our hospital, all patients with chest ains, who are at all "suspect coronaries" by the Emergency Room nurse are admitted directly to he coronary care ward. The program of admission hat follows is triggered only by the fact that this atient has been admitted. The adherence to this outine is aided by a check list. The admitting urse will automatically place the patient in the monitor. She will start oxygen by an oral-nasal mask, start an intravenous drip to maintain an inravenous route for emergency medication. Routine laboratory orders will be initiated to obtain a blood sugar, LDH, SGOT series, plus the routine CBC. A 12-lead electrocardiogram is ordered.

BY THE TIME the physician arrives at the hospital to see his patient, frequently most of the above laboratory work is already available. For the past two months we have routinely started all patients on procainamide, 250 mgs. every 8 hours, either by mouth or intramuscularly. The use of anticoagulants is left to the discretion of the individual physician. It seems to be becoming routine in our hospital. By routinizing admission procedure, we feel there is less chance of overlooking any necessary component of the patient's care. At the end of each eight hour shift a second check list is filled out. This includes a summary of the fluid intake and output, the general patient condition, any problems of arrhythmia, pain or feeding problems, all medications given, and a rhythm strip is run on the electrocardiogram and stapled to the bottom of this sheet.

Thus every eight hours there is a total summary of the patient's condition, complaints and medication. In addition, the nurse is constantly looking for PVCs, or the short runs of tachycardia that may precede a catastrophic arrhythmia. Since we have been using the procainamide routinely on all incoming patients, we feel that the number of even minor arrhythmias have been decreased a great deal. We realize that a certain percentage of these patients admitted in this manner will turn out to have a diagnosis of other than cardiac disease.

However, we do not feel that we have done them any disservice by considering all suspect chest pain as coronary until proven otherwise and may reduce the number of coronary deaths by this routine observance of admitting procedures.

NURSES ADMISSION SUMMARY, CORONARY CARE UNIT



NURSES ADMISSION SUMMARY CORONARY CARE UNIT

BLOOD PRESSURE: 142/90

PULSE: 78 regular

TEMPERATURE: 99

CARDIAC RHYTHM: normal sinus rhythm

DYSPENEA: Some — relieved with oxygen at 6 LPM.

SHOCK: no

CHEST PAIN: on admission - relieved by MS gr 1/2 IV.

DIABETES: Known diabetic

OTHER KNOWN DISEASE: No

CLINICAL STATE: fair

LABORATORY STUDIES	ORDERED	SPECIMEN TAKEN	ADDITIONAL NURSING COMMENT
CBC:	✓	✓	
URINALYSIS:	✓	✓	
BUN:	✓	✓	
BS:	✓	✓	Known diabetic
SGOT: series	✓	✓	6pm - 12mn - 6Am 12n
SED. RATE:	✓	✓	
PRO. TIME:	✓	✓	
L.D.H. :	✓	✓	

ECG 12 LEAD (✓) ORDERED: (✓) TAKEN:

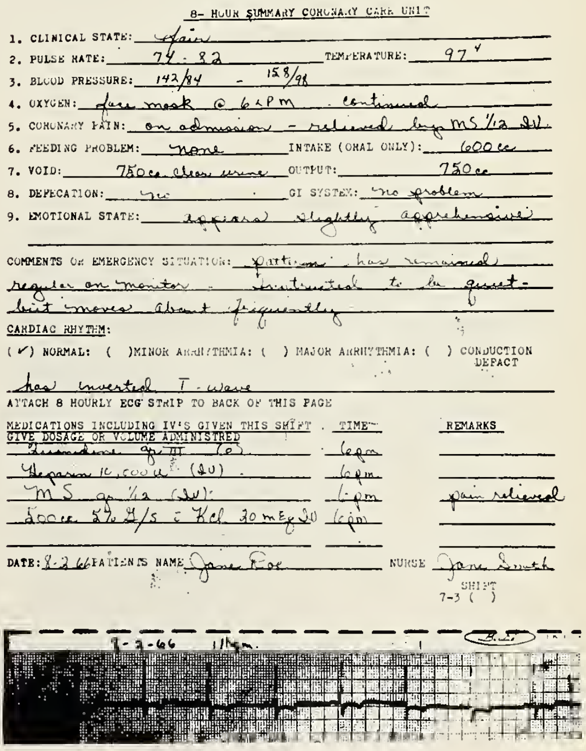
STAPLE RHYTHM STRIP TAKEN ON ADMISSION TO BACK OF THIS SHEET.

DATE: 8-2-66 PATIENTS NAME Jane Roe NURSE: Jane Smith

HOUR OF ADMISSION: 6pm

8-2-66 - 6pm.

8-HOUR SUMMARY, CORONARY CARE UNIT



8- HOUR SUMMARY CORONARY CARE UNIT

1. CLINICAL STATE: fair
2. PULSE RATE: 74 - 82 TEMPERATURE: 97^{4}
3. BLOOD PRESSURE: 142/84 - 158/98
4. OXYGEN: face mask @ 6 LPM continued
5. CORONARY PAIN: on admission - relieved by MS 1/2 IV
6. FEEDING PROBLEM: none INTAKE (ORAL ONLY): 600cc
7. VOID: 750cc clear urine OUTPUT: 750cc
8. DEFECATION: no GI SYSTEM: no problem
9. EMOTIONAL STATE: appears slightly apprehensive

COMMENTS ON EMERGENCY SITUATION: patient has remained regular on monitor - instructed to be quiet - but moves about frequently

CARDIAC RHYTHM:

(✓) NORMAL: ( ) MINOR ARRHYTHMIA: ( ) MAJOR ARRHYTHMIA: ( ) CONDUCTION DEFACT

has inverted T-wave

ATTACH 8 HOURLY ECG STRIP TO BACK OF THIS PAGE

MEDICATIONS INCLUDING IV'S GIVEN THIS SHIFT GIVE DOSAGE OR VOLUME ADMINISTRED	TIME	REMARKS
Quinidine gr III (o)	6pm	
Heparin 10,000 u (IV)	6pm	
MS gr 1/2 (IV)	6pm	pain relieved
500cc 5% G/S c Kcl 30 mEq IV	6pm	

DATE: 8-2-66 PATIENTS NAME Jane Roe NURSE Jane Smith

SHIFT 7-3 ( )

8-2-66 11pm.

SINCE WE ARE a small hospital, we have tried to place all of our serious cardiac problems in one area. Consequently we have used this area for serious congestive heart failure patients as well as coronary care patients. We, therefore, call our unit a cardiac care unit rather than a coronary care unit.

The cost of installation of this unit will of course vary from hospital to hospital depending on the space available for installation and modifications needed. The various types of equipment available vary to some extent in cost. We feel that ours is a basic unit containing all of the essentials necessary for good patient care. The monitoring equipment, including the synchronous defibrillator, and a slave monitor at the desk will cost in the neighborhood of $16,000.00.

We have not felt operational cost to be excessive. Since the unit is immediately adjacent to the main nursing station, the duty nurse at all times functions as the cardiac unit nurse. We have found it much easier to care for three acutely ill cardiac patients in one area. This ease of nursing care is translated into better care and lower cost.

The results of the operation of our unit to date have been very gratifying. We feel there is no longer a doubt that these are feasible units for small hospitals.

Since its inception, we have admitted 81 patients to our cardiac care ward. Of these, 60 were diagnosed as either acute coronary occlusions or acute cardiac emergencies by reason of major arrhythmia or severe decompensation. Eleven have been admitted with the diagnosis of angina, but without evidence of infarction. Ten were admitted whose final diagnosis was something other than cardiac disease.

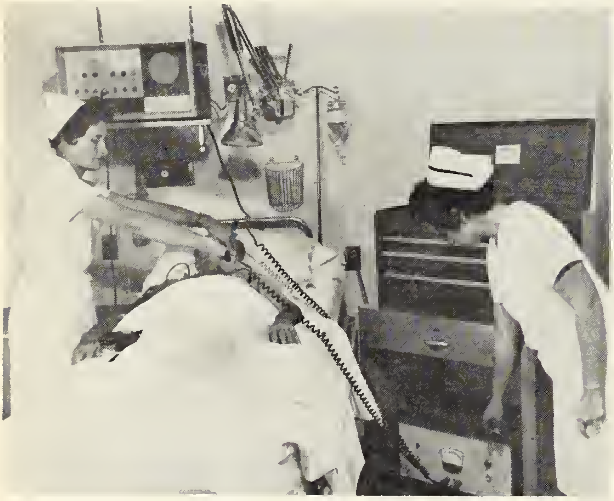


FIGURE 2: Nurses apply defibrillation electrodes to a patient in the cardiac care unit.

We have had a total of nine deaths in the unit. Of these, two died within an hour of admission and seven died from 12 hours to 18 days after admission. One of the latter group died of an embolism to the right femoral artery 24 hours after admission. We have had a total of eighteen cardioversions by counter-shock. We have experienced two ventricular standstills. One was successfully resuscitated by the nurse on duty, and the second one expired.

IN ADDITION TO the reduction in morbidity and mortality, there have been additional benefits that are difficult to document. There has been a much better nursing program because of the instruction given as a result of the establishment of the unit and because of the interest shown.

There has been an increase of physician interest in better care. No problems of the family physician caring for his own patient in the cardiac room have been experienced. We have tried to adopt a routine care so that all patients are treated in the same manner. This has created a feeling of confidence on the part of both the nurse and the physician. Nurses feel that they know the natural progression of these cases and are aware of any deviation of the normal recovery rate.

The physicians feel that their patients are receiving the best of the hospital's ability. Patients, themselves, have responded very well to the use of the room. The only problem has been to remove them from the cardiac care unit when there is no longer a need for its use. Patients develop a sense of security under the watchful eye of the nurse and the monitor system, that they miss for a day or two, when they are moved out to the general care ward.

AT THE PRESENT time, even with our relatively short experience in this unit, we have no reservation in urging small hospitals to install a similar type of unit. It is very much easier for a single duty nurse to care for two or three seriously ill cardiac patients brought together in a single area under the eye of the duty nurse, equipped with training and monitoring instruments, than it is to have them scattered throughout the various rooms in the hospital.

Results in morbidity and mortality speak for themselves.

The increased confidence of the community in their hospital is apparent. The translation of the modern techniques of monitoring and pacing can be combined with education of nursing personnel, to make a cardiac care unit in a small hospital both feasible and practical. □

SECOND ORIGINAL ARTICLE
ABOUT CARDIAC CARE

A Preliminary Progress Report

BY WILLIAM M. LEFEVRE, M.D.
MUSKEGON

During the summer and fall of 1965, the administration and staff of Mercy Hospital, Muskegon, Michigan, investigated the possibility of opening a room equipped for the special care of coronary and arteriosclerotic cardiac problems. In September, 1965, the decision was made to go ahead with such a plan.

A four-bed ward was divided into three cubicles using fiberglass partitions. A nurses monitoring desk was installed at a point where the patient could be watched 24 hours a day.

NECESSARY EQUIPMENT was purchased, including two Monitor-pacemakers (used at the bedside), a cardioverter, a heart-rate-indicator-alarm (used at the desk), a transistor pacemaker, and an automatic rotating tourniquet apparatus.

The Cardiology Committee then began its most important task — educating the group of registered nurses who would be involved in staffing the unit itself — around the clock.

The response to this proposal on the part of the nurses was, at first, rather poor. A few were enthusiastic and felt honored to be a part of a new method of improving patient care. Some were fearful that the responsibilities involved were too great; for many, the idea of attending classes, studying, etc., seemed overwhelming.

Twelve nurses attended the two-and-one-half hour sessions daily for five weeks. Each nurse was given an excellent textbook on coronary care unit nursing. The material covered, formulated by the Inservice Department and the Cardiology Staff, consisted of two major parts: 1) the physicians' lectures, and 2) the Nursing Care studies. During the fifth week, clinical experience such as applying electrodes and monitoring was the main objective.

Patients with a definite diagnosis of myocardial infarction, patients presenting symptoms indicating that the possibility exists, patients with severe congestive heart failure, and patients with cardiac arrhythmias have been admitted. The results thus far have been favorable. At least 10 successful cardioversions of arrhythmias have been performed on an elective basis. Emergency defibrillations on one patient were successful nine times during his course in the unit. Nurses themselves did the defibrillating five times when no doctor was immediately available.

THE NURSING STAFF'S attitude towards this unit has changed a great deal. More than one nurse has expressed a desire to become a member of the C.C.U. staff. The tapes taken during the classes, the text book, plus actual experience with an original member for several weeks before going on duty alone, have proven adequate in teaching a new nurse.

Auxiliary personnel, such as L.P.N.'s and recent graduate P.N.'s, have been given an opportunity to spend at least two weeks in the unit. The entire nursing staff is alert to "Code Blue," the emergency call to which pre-designated personnel from each shift, plus any doctor in the house, respond to give aid in closed chest cardiac resuscitation, or whatever emergency steps are necessary in the event of cardiac arrest or ventricular fibrillation.

Since each patient remains in the unit for the first critical days only, (three to five or more depending on his condition), personnel from other medical areas gain by their experience in the unit, as they know more about what to expect when the patient is transferred.

THE PATIENTS' FEELINGS towards the unit have been observed. A certain degree of apprehension is involved when they are placed in an "intensive care unit" and "hooked up" to a monitoring device. Fears have been allayed by a thorough explanation of why the patient is here and just what the equipment's purpose is.

Rapport between patient and nurse has been excellent. In most instances, patients regret transferral. This may be due in part to their dependence on the monitors and the knowledge that a nurse is constantly in vigilance, but also because of the close relationship established in the unit of doctor, patient, and nurses. Needless to say, this same relationship is more difficult to achieve in larger areas.

The individual nurses feel somewhat like new student nurses with new zeal because it is so stimulating to know that the existence of such a unit makes possible better care and lower mortality rates. Trouble can actually be seen coming in many instances, and although the nurse may not know exactly what is wrong, she recognizes an aberration from the normal. Thus the doctor can be alerted and prescribe treatment.

MONTHLY CONFERENCES attended by the Cardiology Staff, interested general practitioners, the Nursing Service Director, and the C.C.U. Staff have proven to be of great value. Recent and interesting patients' cases are reviewed, and any problems or policies ironed out. Sharing experiences serves as a stimulant as well as an opportunity to keep abreast of new developments.

Author

William M. LeFevre, M.D.

Muskegon

The excellent preparation by the physicians, the cooperation and patience of the administration and Nursing Service, and the ever-watchful, "caring" guidance of an enthusiastic Chief of the Coronary Care Unit have made this a successful, rewarding service.

THE UNIT IS open to all cases of coronary thrombosis, serious cardiac arrhythmias, and cardiac failure no matter what the etiology might be. The patients remain in the unit as long as their condition appears serious. They are treated by their own physician but the advice and consultation of the members of the coronary care committee is always available.

During the first six months of operation, a total of 71 patients were admitted to and discharged from the unit. The average stay within the unit was a fraction over four days, and the average total stay in the hospital was 15.8 days.

Of the 71 patients admitted, five died, two of them in less than 24 hours after admission. Four of the five deaths had acute severe or massive infarctions. The other case was arteriosclerotic heart disease with ventricular fibrillation and died nine days after admission.

Of the 71 cases, 32 were admitted with a diagnosis of acute myocardial infarction. Twenty-three had evidence of coronary heart disease and four were in acute cardiac failure. The remaining cases included some who were suspected of having coronary disease but were proved otherwise after a day or so of observation and study.

Fifty of these cases either had arrhythmias on admission or developed this complication during the course of treatment. Twenty-three of these arrhythmias were in cases of myocardial infarction and twenty-seven in the non-infarction group. These later included cases of arteriosclerotic heart disease, cardiac failures and rheumatic heart disease.

The arrhythmias found in these 50 patients are listed below:

Atrial Tachycardia	5	Premature ventricular contractions	22
Atrial Fibrillation	9		
Atrial Flutter	1	Premature nodal contractions	3
Bundle Branch Block	8		
First degree A-V Block	1	Ventricular tachycardia	6
Second degree A-V Block	4	Ventricular fibrillation	4
Complete A-V Block	4	Sinus bradycardia	2
Premature auricular contractions	5		

In all, nine cases were defibrillated during the first six months, one of these for a total of nine times.

The Pacemaker was used on one patient, with good results. □

ORIGINAL SCIENTIFIC ARTICLE

Symptomatic Synechia Vulvae

BY PATRICIA O'CONNOR, M.D.
ERNEST H. WATSON, M.D.
BOTH OF ANN ARBOR

Abstract: Adhesions of the labia minora, syne- ia vulvae, is a relatively common finding in in- ncy and early childhood. It may be present th urinary tract infection symptoms. The recog- tion of this and its separation from other ana- mic anomalies is important.

Synechia vulvae, or labial adhesions, is a com- n condition found in young girls. The adhe- ns can be disconcerting to mothers and to young ysicians who may diagnose this as a congenital omaly and proceed with studies such as IVPs d urinary 17-ketosteroids. The major complica- n of synechia vulvae, aside from parental anxie- , is stasis of secretions behind the agglutinated lds which can lead to dysuria, enuresis, and pos- ly to ascending urinary tract infection.

Review of several symptomatic cases at the Uni- rsity of Michigan Pediatric Clinic suggests that rents and physicians should be more aware of is condition, and that treatment of synechia is nerally indicated.

CASE REPORT

An eight-year-old girl was referred to this clinic ith a five-month history of a "kidney infection". e had been enuretic for six-seven months prior being seen. There were no systemic symptoms. rinalysis showed two plus albumin, no reducing bstance, specific gravity 1.026, many WBCs and cteria on microscopic examination. On physical amination the only abnormal finding was a firm, brous adhesion of the labia minora extending the ngth of the labia with a ¼ inch opening mid- ay in the adhesion (See figure). The perineum as moderately inflamed.

She was referred to the Gynecology Clinic where e adhesion was easily separated with analgesia and local preparation. The opening was found to be anterior to the urethral and vaginal orifices which had opened into the dependent sac where secretions pooled. Sitz baths and estrogen cream were prescribed.

One week later she was no longer enuretic. Urinalysis was as follows: specific gravity 1.027, trace of albumin, and microscopic examination revealed 0-2 RBCs, 1-2 WBCs, several epithelial cells and cocci per high-power field. She was seen in the Urology Clinic where a catheterized specimen showed no albumin, cells or organisms on microscopic examination, or growth on culture. The impression was "no infection of the urinary tract."

Vaginal discharge was cultured and grew strep enterococcus. This discharge persisted until she was treated with Gantrisin. Subsequently (1 and 5 months later) urinalyses were normal and she was symptom-free.

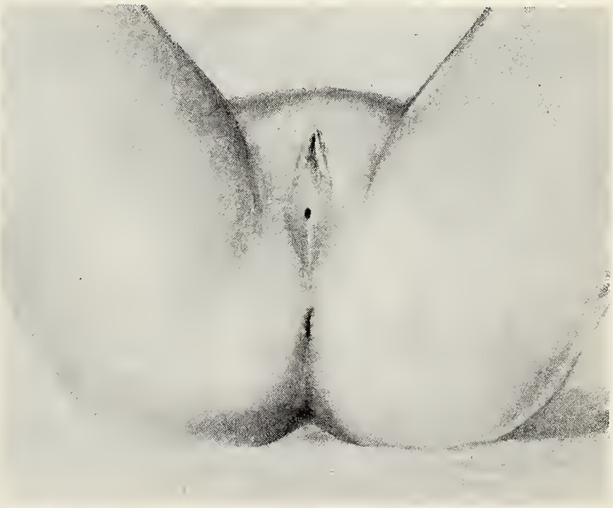


Illustration of synechia vulvae. Note the fusion of the labia minora with only a small opening. Superficial examination might indicate absence of a vagina.

Doctor O'Connor is an assistant professor of pediatrics d Doctor Watson is a professor of pediatrics, both at the niversity of Michigan Medical School.

Following this case, several other milder cases of synechia vulvae have been seen in this clinic. These include:

Age	Findings
4 months	Child seen for congenital heart disease. Noted by nurse to have fused labia. Urine showed a trace of albumin.
2 years	Child had unexplained high fever. Attempts to obtain a clean voided urine specimen unsuccessful due to labial adhesions.
2 years	Symptoms of dysuria noted.
2 years	Dysuria noted.
4 years	Child seen for convulsive disorder work-up. Mother reported she was "growing together there." Urinalysis showed albumin, many WBCs and cocci.
7 years	Child complained of pruritis.

In each case except that of the seven-year-old, the adhesions extended almost the length of the labia with an opening at some point in the fusion line. In each case the fusion was broken by gentle dissection using a swab and the mother was instructed in applying vaseline to the raw edges until they healed. The seven-year-old had partial readherence, but no other recurrences were noted.

DISCUSSION

Labial adhesions were first reported in the American literature in the 1930's. Early reports suggested possible congenital etiology. The report by Nowlin[1] of 110 cases, 57 of which had normal perineal examination at birth and 20% of which had recurrences, and the report by Anderson[2] of recurrences in three cases followed longitudinally, clearly indicate an acquired etiology. It is likely that the labial edges become raw when the perineum is irritated by a diaper rash or vulvar discharge, and approximate as they heal.

Urinary tract symptoms seen with labial adhesions include dysuria, enuresis, pruritis, and possibly ascending urinary tract infection. Urine specimens may show albumin, cells, and bacteria. Of Nowlin's[1] 110 cases, 20% had urinary tract symptoms. Glenn[3] in 1962 reported two cases in which urinary tract symptoms prompted investigation under anesthesia to rule out other urinary tract disease. Catheterized specimens may be required to rule out infection of the upper urinary tract when adhesions are present or recently separated.

There is no universally accepted method of treatment for labial adhesions. Because of recurrences, some recommend no treatment if there are no symptoms.[2] Others, such as Huffman,[4] recommend use of estrogen cream over a period of time rather than direct separation of the agglutinated folds. The treatment recommended by Nowlin,[1] namely simple separation of the labia minora with application of a bland ointment to the raw edges to prevent reagglutination, has been successfully used in this clinic. Lubrication and attention to perineal hygiene, rather than hormone effect, ar probably the most important elements of follow up treatment after labial separation. In young in fants and in cases of fragile adhesions, analgesi at the time of separation is not necessary.

To prevent labial adhesions, attention to per neal hygiene is indicated. On review of *Infan Care*,[5] *Your Child from One to Six*,[6] and *Bab Care*[7] by Spock, no mention was found of labia adhesions. The only specific suggestion about rou tine perineal care in girls was found in *Infan Care*.[5] In the section on "Bathing the Baby," us of a piece of cotton to clear away cheesy materia between the labial folds is suggested. Treatment o the irritated perineum is discussed in these books

Mothers should be instructed in cleaning be tween the labia minora and majora, and in wip ing from front to back. They should know abou the possibility of labial adhesions developing, es pecially after the perineum becomes irritated Bland ointments on the raw areas and soak should be used in case of perineal irritation. Littl girls should be taught to clean themselves from front to back. Physicians should include inspection of the perineum in all routine well child exami nations.

SUMMARY

Synechia vulvae, or labial adhesions, frequentl present with urinary tract symptoms. Treatmen by separation of the agglutinated folds and follow up with lubrication and attention to perineal hy giene is recommended. To prevent synechia, mo thers should be made aware of the importance o good perineal hygiene and the possibility of labia adhesions occurring when the perineum is irri tated. □

BIBLIOGRAPHY

1. Nowlin, P.; Adams, J. R.; and Nelle, B. C., Jr.; Vulvar Fusion, J. Urol. 62: 75-79, July, 1949
2. Anderson, O. W.: Treatment of Labial Adhesions in Children, J.A.M.A., 162: 951-953, Nov. 3, 1956
3. Glenn, J. F.: Labial Fusion and Urinary Infection, J. Urol. 87: 485-486, March, 1962
4. Huffman, J. W.: Vulvar Disorders in Pre-menarchal Children, Clin. Obstet. Gynec. 3: 154-164, March, 1960
5. *Infant Care*, U. S. Dept. H.E.W., Children's Bureau Publication No. 8, 1963
6. *Your Child from One to Six*, U. S. Dept. H.E.W., Children's Bureau Publication No. 30, 1956
7. Spock, B.: "*Baby and Child Care*," 1957, Giant Cardinal Edition, Pocket Books, Inc.

The Role of the Physician In the Treatment Of Marital Discord

BY PETER A. MARTIN, M.D.
DETROIT

Abstract—This paper stresses that physicians ho deal with marital discord are in the front ne of defense in the treatment and prevention of ental illness and in the promotion of mental ealth. This approach emphasizes the importance f preparation for marriage and the maintenance f good marriages in the sense of an environment at can facilitate the mutual and individual deelopment of different generations.

The functioning of the family in promoting ealthy emotional growth and development in arents and children; or, conversely, the family's ontribution to the development of mental illness n its members, is of utmost importance.

Physicians who deal with marital discord are herefore in the front line of defense in the treatnent and prevention of mental illness and in the romotion of mental health.

The physician interested in mental health and n sound methods of child-rearing to prevent beavior disorders is concerned with how to help oung parents to establish a good marriage. This pproach emphasizes the importance of preparaion for marriage and the maintenance of good marriages in the sense of an environment that can facilitate the mutual and individual development of different generations.[1]

ALTHOUGH THE relationship of the family physician is a strategic one in promoting a healthy family atmosphere, all too often physicians try to avoid this role. Some seem loathe to think of themselves as marriage counselors or as psychotherapists; even when it is expected of them by the patients and even though it is a vital part of the ideal of the complete physician. Marriage counseling has been, through the years, mainly in the hands of the clergy and with those families not having such ties, in the hands of family physicians. Recently, psychologists, psychiatric social workers and psychiatrists have become interested. With these groups, the emphasis has centered mainly around family dynamics in various mental disorders rather than around the institution of marriage itself.

IT MAY AT first seem surprising that in one survey, 7% of physicians stated unequivocally that they will not discuss marriage problems even in response to patient requests.[2] This, however, is understandable when we realize that many physicians have been largely unprepared for such a role in their medical school training. Some experience anxiety in this situation and are happy to

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send the patient to a marriage counselor, whom they believe is better trained to handle the situation. This medical tradition of "Primum Non Nocere = first do no harm" is laudable.

But it is pathetic if the physician is unable to render help with marriage problems when this help is specifically requested and urgently needed by his patients. This is especially so, at those times when the marriage counselor who eagerly accepts such a client is even less trained than the physician who turned the patient away.

Some physicians are unaware that the intensive medical school, interneship and daily experiences in the doctor-patient relationship are the foundation stone upon which one builds counseling and psychotherapeutic endeavors.

MICHIGAN LAST YEAR was shocked by a series of newspaper exposès into the activities of some unqualified marriage counselors in private practice. The scandal resulted in legislation by the 1966 Michigan legislature licensing "marriage counselors."

The legislation is laudable in its efforts to eliminate untrained individuals. However, it establishes a new profession which has no university department designed to train individuals in such a discipline. Also the distinction between counseling and psychotherapy is often a theoretical one and in practice, psychotherapy may be carried on by individuals whose training is limited. Also, if doing psychotherapy is practicing medicine (a much-debated issue) then physicians by default or intent have allocated this area of medicine to paramedical personnel. This, of course, seems to be the trend in several other branches of medicine.

Gynecologist William H. Masters has stated that even the treatment of sexual problems between marriage partners has been taken away from physicians by willing non medical personnel.[3] He deplored the abandonment of this area by physicians based on the fact that their position of doing a diagnostic physical examination gives them an immediate advantage in overcoming the natural hesitance of patients in speaking of such intimate matters. He stated that the physician's performance of a complete initial physical examination not only uncovers physical factors contributing to sexual difficulties (such as uncovering an early case of diabetes mellitus in a male with a symptom of impotence) but also adds a personal element of trust and confidence not available to the non physician therapist. The complete physical examination of both partners is an important part of Dr. Masters' current research into the treatment of sexual problems in marriage.

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IT BEHOOVES the physician to be aware of the marital problems of troubled patients. It is a rewarding experience for physician and patient to discover the relation between a patient's functional complaints and the marital problems which he is experiencing.

The well-publicized survey made in North Carolina by Herndon and Nash[2] showed that the majority of marital problems discussed with physicians differed little for husband and wife. The male patients were concerned mainly with problems of sexual adjustment, money problems and dissatisfaction with the amount of affection displayed by the wife. The problems of most concern to female patients were those of sexual adjustment, fear of pregnancy and dissatisfaction with the amount of affection displayed by the husband.

However, experience in treating sexual problems in marriage partners teaches us that symptoms are mainly manifestations of the discord present in the interpersonal relationship. They illuminate the nature and dynamics of the disturbed interpersonal relationship.[4] Superficial complaints cover the deeper underlying problems of immaturity, and hidden resentments.

Following publication of an article[4] in Michigan Medicine on "Sexual Problems In Marriage," I received phone calls from two physicians requesting consultation on the problem of impotence. In both cases, the discussion of the presenting symptom quickly gave way to material concerning resentment against their wives. With resultant improvement in the relationship to their wives, the symptom quickly disappeared.

ALL HUMANS HAVE experienced conflictual situations in childhood. When successfully resolved, the healthy mature individual has a freedom to adapt to new realities and to form a healthy union in marriage. When a solution to early conflicts is not found, the individual tends to deal with childhood conflictual situations by repetitiously reexperiencing them in some form throughout later life. The purpose of this activity is to find a solution and thus be free of the conflict.

Marriage and the choice of a marriage partner form one area in which to resolve the conflicts. Many people succeed in realignment of internal forces through the new opportunity offered by the marriage relationship. When the individual fails in this effort for a healthy relationship, the problem may be intensified with resulting marital disruption and with a deleterious effect upon the health of the marriage partners and of the involved children.

It is commonly agreed that "primarily, a harmonious marriage involves two relatively mature persons who have found realistic satisfactions and creative fulfillment separately in their own lives and by their own efforts, but who have found that individual satisfaction is enhanced and enriched by sharing it with another."[5]

THE ANALOGY WHICH I prefer is that a harmonious marriage is like looking down a cool, tree shaded street. On each side of the street are sturdy upright trees. The overhanging shade-giving arch results from boughs from each side which keep out the bright, hot sun. They are the result of the collaboration from each side and could not be accomplished without such joint participation. This ideal fortunately is attained by many.

However, it is difficult for those individuals failing to resolve childhood conflictual situations via the marriage to even conceptualize let alone achieve this ideal. The reason is that the childhood situation is a child-parent or dependent-independent situation. The independent collaborative situation of the ideal marriage can exist only between two adults. Dependent-independent and especially dependent-dependent types are threatened by collapse and divorce.

The role of the physician in an already disturbed marriage is to see if he can establish or reestablish an equilibrium approaching the ideal model presented above. Individuals come into marriage with varying degrees of flexibility and capacity for maturation in their character structures. It is upon this capacity that the physician counts for establishing equilibrium.

WHEN THE PHYSICIAN addresses himself to the treatment of marital discord, he does so through making an appeal to the members to step back and try to perceive the needs of the other one and then to live together with a greater degree of tolerance.[7]

With those patients having fixed character disorders, the character determines the fate of the marriage. This is the type which should be referred to a psychiatrist for treatment.

Physicians are most frequently consulted for premarital examinations, for advice on genetics in certain hereditary illnesses and on sexual matters such as techniques of intercourse and contraceptions.

The latter requires a thorough knowledge of sexual functions and an open mind about sexual matters which not all physicians and psychiatrists possess.[6] Medical students are often not aware of methods of intercourse, psychological problems about them, and skills that can enhance materially satisfactory relationships. Too often, the medical curriculum does not offer such material.[4]

THE ROLE OF the physician is to guide, direct and inspire the marriage partners, thru the power of his position combined with his scientific knowledge to the full development of their individual and partnership potentials. If his medical school training has not prepared him for this, then postgraduate courses are readily available. I can also recommend a close working relationship with a psychiatrist involving supervision of work with marital problems. The majority of such problems can be handled by knowledgeable physicians.

It is the physician's set of attitudes which contributes to or interferes with the work that he has to do as a doctor. Although he may have a lack of know how in interviewing techniques, the latter is easy to remedy by additional training. It only takes additional time. The problem of attitudes is more difficult to change. It entails continuous growth, development and maturation of the physician's character.

In a recent syndicated newspaper feature[8] on pastoral counseling the statement was made that pastoral counselors are beginning to think that preventive therapy may be the major service they can offer American marriages. They believe that by being available to talk over emotional problems before they reach the critical stage, they can very often prevent irreparable damage. Coming for help too late is like not visiting the doctor until the disease is too far along to be successfully treated.

One pastoral counselor suggested that couples give themselves an annual marital checkup like the physical checkup that doctors recommend each year. Some of the things for married people to examine are their attitudes toward money, problems of sexual adjustment, their relationship with in-laws, their manner of handling disagreements, and how well they are able to communicate their feelings to each other.

It behooves physicians who feel their responsibility as the first line of defense in the prevention of mental illness to include just such an examination of the marital situation as a vital part of the complete physical examination of his patients.

IT IS IMPOSSIBLE to overstress the importance of prevention with the problems of marital discord. Education in family living is becoming a standard course in the high school curriculum. The premarital exam by physicians is not only an opportunity for education for success in marriage but also for prevention of some marriages that should never take place.

Many marriages that end in divorce or a lifelong tragic marriage result from getting married for the wrong reasons. Marriage should not be an attempted escape from a situation which the young person cannot tolerate. The fantasy of security in marriage often leads to severe disappointments from which the now child-burdened individual cannot escape.

Physicians have the unique opportunity, while having the premarital serological tests done, to practice the highest calibre of preventive medicine in his talks with the future builders of a constructive or destructive family unit. □

REFERENCES

1. Redlich, F. C., Freedman, D. X., The Theory and Practice of Psychiatry. Basic Books, New York, 1966.
2. Herndon, C. M., Nash, E. C., Marital Counseling, *J.A.M.A.* 180:395, 1962.
3. Masters, W. H., Johnson, V. E., Academic Lecture. Annual Meeting Academy of Psychoanalysis, Atlantic City, 1966.
4. Martin, P. A., Common Sexual Problems In Marriage. *Michigan Medicine.* 64:323-27, 1965.
5. Kriegman, George, A Systematic Approach to the Evaluation and Treatment of Marital Problems. Medical College of Virginia Quarterly, 1:36, 1966.
6. Leif, H. I., "What Your Doctor Probably Doesn't Know About Sex" Harpers 229 (December 1964) p. 9.
7. Brown, S., Panel on Conjoint Therapy. The Psychoanalytic Forum. Vol. 1, No. 2, 1966. p. 154.
8. Mulcahey, A., Troubled Marriage. This Week, August 21, 1966.

The Future of Health Insurance Prepayment and Medicine A View of 1985

BY CHARLES P. HALL, JR., Ph.D.
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Forecasting any aspect of a dynamic economy is risky at best, even in the short run. Attempting a long range projection when the subject is currently experiencing a structural revolution and is historically fraught with political, social and emotional overtones may well qualify the prophet as a fool. But even fools occasionally make a contribution, so the effort may be worthwhile.

Medicine is certainly in transition, if not revolution.[1]

This can be attributed primarily to the scientific explosion of recent years and the concurrent trend toward specialization. The emergence of group practice arrangements is another development that may take on added importance in coming years. The social and political pressures faced by medicine in the last three decades are unprecedented in this country and are likely to continue with increasing intensity in coming years.

Insurance, too, is always subject to political pressures, but the health insurance field is especially vulnerable to social and emotional pressures because it is inextricably related to sickness and injury in addition to financial stress. The health insurance industry has, with medicine, been through a period of remarkable change in recent years.

HISTORY

DEVELOPMENT. Historically, both health insurance and prepayment plans have relatively recent origins in this country, and each is indebted to a unique setting which gave tremendous initial impetus to its growth. Prepayment, as epitomized by the Blue Cross idea, was essentially a product of the great depression, and was directed as much toward solving the pressing economic problems besetting hospitals as toward serving the needs of consumers. True, some beginnings had been made prior to the depression, notably in the state of Washington, but it was during the 1930's that Blue Cross got started and enjoyed its most spectacular growth rate, largely unimpeded by competition from commercial insurers.[2, 3] Had it not been for the unpaid bills and empty beds facing the hospitals, it is extremely doubtful that prepayment plans could have spread so rapidly, since consumer demand in the period was virtually nonexistent compared to the pressures in later years.

Commercial health insurance plans are mainly indebted for their early growth to World War II and the wage freeze which accompanied it. Traditionally noted for conservatism and a tendency to react to situations rather than to initiate change, it may be presumed that even in the absence of wage controls the insurance industry would have entered the health field in response to the favorable acceptance of Blue Cross and Blue Shield. The introduction of various legislative proposals for national or state compulsory health insurance plans, notably the Wagner-Murray-Dingell bill, would also have stirred insurers to action.

However, it is clear that despite a few scattered efforts in earlier periods, the real growth of health insurance came with the development of group insurance growing out of wage stabilization efforts by the government during the war.[4] The rapid assimilation of "fringe benefits" into collective bargaining sessions during the 1940's[5] assured continued growth to commercial health insurance plans and prepayment mechanisms alike.[6]

A third major influence in the development of health insurance, aside from the "Blues" and commercial insurers, has been prepaid group practice plans.

These plans are omitted from the present discussion solely because a separate MSMS paper dealing exclusively with their future is being prepared by Caldwell B. Esselstyn, M.D., of the Community Health Association in Detroit.

These plans have had an impact which greatly outweighs their statistical significance in terms of size. Despite many proclaimed advantages, however, their growth to date, has been relatively slow. This is probably attributable in large part to three main factors — an apparently inherent geographical limitation, the relatively impersonal relationship between members of the plans and the panel of physicians, and the frequent inability to surmount the initial financing barriers in terms of capital outlay. The most important of the claimed advantages for these plans are higher quality care, lower costs, and more attention to preventive medicine.

THE PERCENTAGE OF Americans with some form of health insurance protection rose spectacularly during the period from 1940 to 1956, growing from approximately ten per cent to just under seventy per cent of the civilian population. The sharpest increase came between 1946 and 1950, when the percentage rose from slightly less than thirty per cent to just over fifty per cent. Since 1956 the growth has been steady but less spectacular, as the industry has struggled to extend coverage to the entire "insurable" population, with emphasis on the elderly and many hard to reach individuals, including farmers and others. By 1956, seventy-nine per cent of the civilian population (over 151 million) had some coverage.[7]

Despite these rather impressive statistics, deficiencies remain. The four major categories of health insurance are hospital expense, surgical expense, regular medical expense and major medical expense. The latter three types of coverage are usually supplementary and/or complementary to basic hospital expense coverage. Of the three, however, only surgical expense coverage has reached a similar segment of the population. Over ninety-three per cent of the persons with hospital insurance also have some surgical coverage. The comparable figures for regular medical and major medical coverage are less than seventy-two per cent and approximately thirty-one per cent, respectively.[8] Even in terms of numbers, then, there is much room for improvement. When the actual extent of coverage provided under many contracts is examined, however, the "numbers game" becomes even less impressive.

The fifth category of health insurance, known as disability income or income protection insurance is currently available only through commercial insurers, self-insured employer plans and the government. The federal government benefits are provided under disability provisions of the Social Security Act. Four states also have non-occupational disability benefits. These disability income benefits will be discussed later.

APPROACH AND PHILOSOPHY. Many studies have been conducted to determine the quality of health insurance benefits.[9] Without examining them, it should be pointed out that it is possible to evaluate health insurance and prepayment on at least two different levels. First, they may be judged in terms of accomplishing what they set out to do. In other words, if the health insurance and prepayment mechanisms set out to cover hospital expenses, they may properly be evaluated on how well they attain that objective. Frequently, however, they are castigated because they cover only a modest percentage of total consumer expenditures for health care services. At this level it may be appropriate, but it hardly seems reasonable to contend that the system is no good on the grounds that it fails to pay benefits which were not contracted for in the first place.

Several basic differences in the historical objectives and philosophies of health insurance and prepayment are generally cited, and though the

Deficiencies remain in health insurance programs

Health insurance industry short of demands today

distinctions have frequently become blurred over the years, they are worth mentioning briefly. The prepayment plans have generally been concerned with so-called first dollar coverage based on a service benefit concept. These plans have contracted with the purveyors of services to accept agreed upon payments from the plan as full reimbursement for specified services. The plans then contract with their subscribers to pay for certain services. In this situation, the primary cost controls are the contract between the plan and the purveyors of services and the limit on the services to be provided.

Health insurance companies have been identified primarily with indemnity contracts. Their contracts are solely with the consumer, and they generally agree to reimburse the insured on some specified basis for expenses incurred, regardless of whether or not the indemnity payment is adequate to pay for the services rendered. Here the main cost control is the dollar allowance for a service. Insurers have borrowed from their experience in other fields and have generally emphasized the theoretical objective of insurance to pay for large and unexpected occurrences rather than recurrent expenses which may be classified as budgetable. They have usually employed deductible and coinsurance (percentage participation) clauses as means of eliminating "nuisance claims" and giving the insured a "continuing incentive to recover."

At the present time it is impossible to rely on these historical concepts to differentiate between plans. Many prepayment plans offer deductible and coinsurance options and many have income limits on the provision of service benefits. On the other hand, many insurance company plans approach a full service benefit concept through the allowance of "usual and customary" or "reasonable and customary" charges.

PRESENT SETTING

In 1966 the health insurance industry[10] is in the strange position of having accomplished more than anyone thought possible twenty years ago, yet falling short of what is demanded of it today. For example, in 1948 Oscar R. Ewing, the Federal Security Administrator, made an official report to the President stating that, "at a maximum only about half of the families in the United States can afford even a moderately comprehensive health insurance plan on a voluntary basis." Today, nearly eighty per cent of the nation's population has some coverage, and in some states the percentage is as high as ninety per cent. It may, of course, be correct to question the "comprehensiveness" of much of this coverage. Unfortunately, nearly everyone has his own definition of "comprehensive," so no single standard is available as a yardstick. In general terms, however, most would agree that it should include a fairly broad range of in- and out-patient services with no more than modest deductibles and with high (at least $10,000) maximum limits. Beyond this, degrees of comprehensiveness do and will continue to exist.

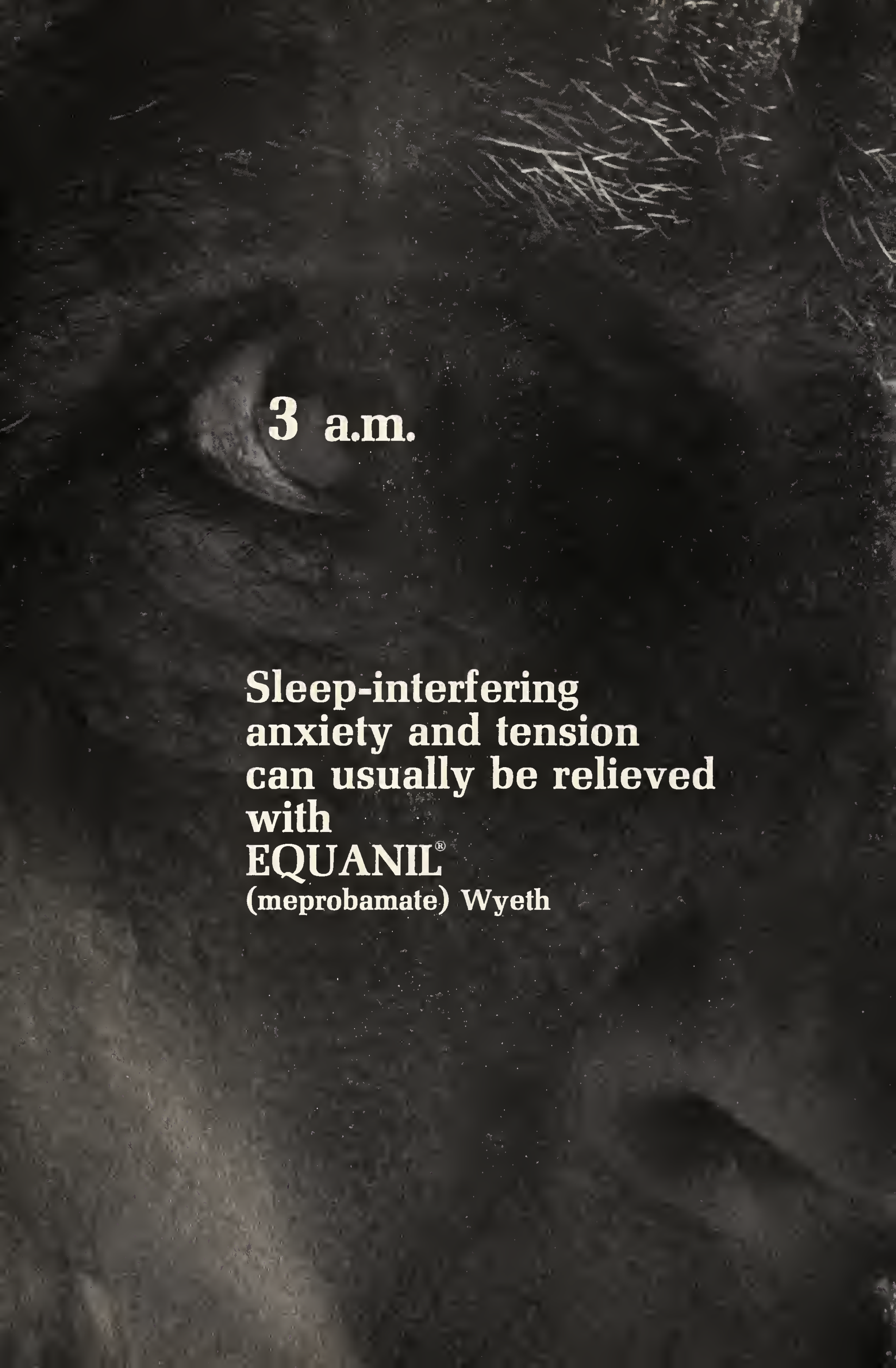
GOVERNMENT INVOLVEMENT. In the late 1950's great and continuing pressure was mounted in support of compulsory federal health insurance for the aged. The insurance industry responded quickly, and through various techniques, many of them never tried before, it succeeded in extending coverage to over sixty per cent of the elderly population by 1965. Despite this Herculean effort, however, and notwithstanding the nearly unanimous

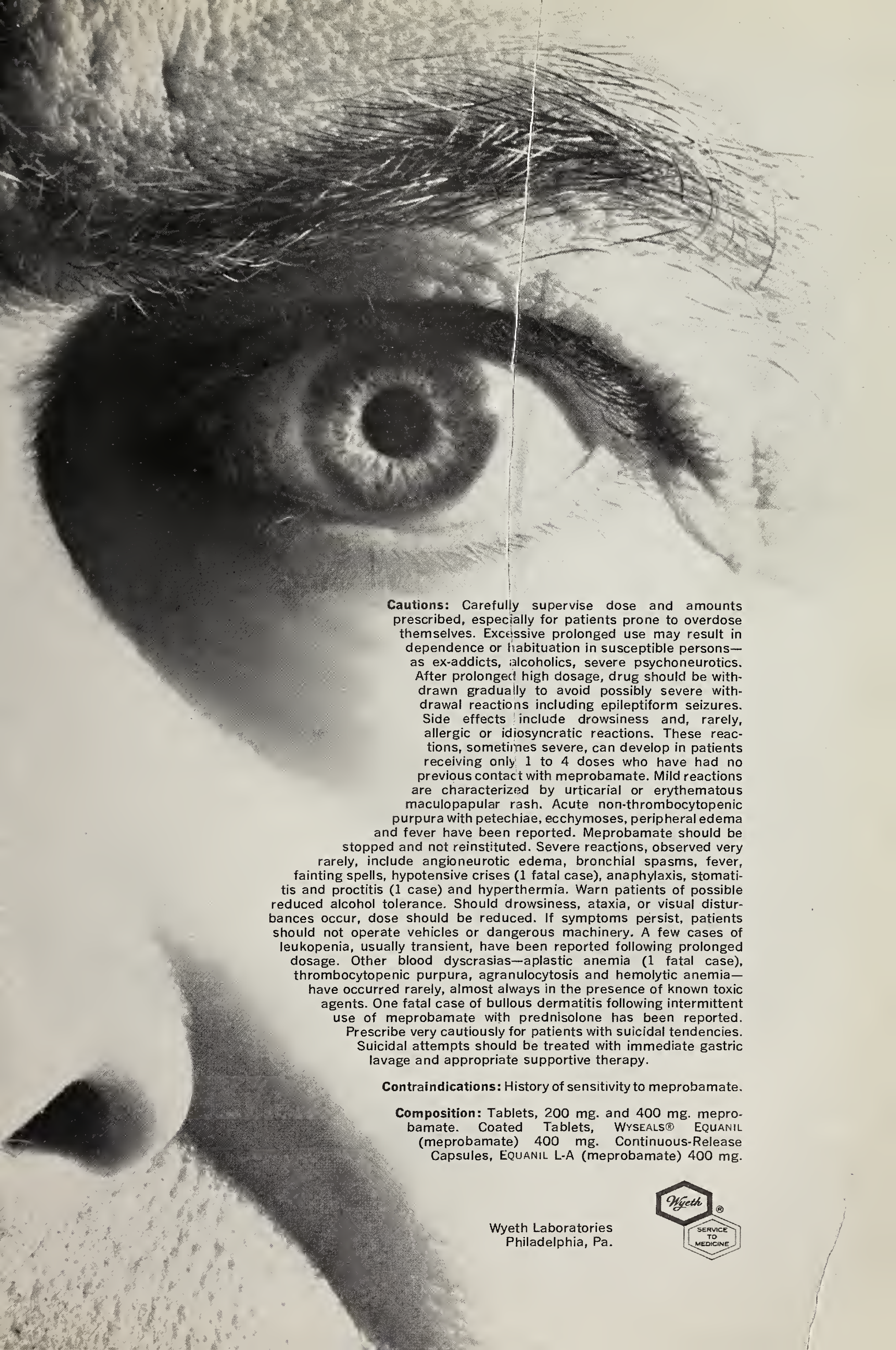
(Continued on Page 34)

EDITOR'S NOTE: This excellent article is written by a nationally-recognized authority on economics, Charles P. Hall, Jr., Ph.D., who is presently Professor of insurance at Temple University in Philadelphia. Professor Hall formerly served as Assistant Director of the Medical Finance and Economics Research Department at the American Medical Association.

This paper is one of a series of 10 "position papers" commissioned by the MSMS Committee on Medical Socio-Economics. The papers aim to inform Michigan physicians about the environment in which medicine will be practiced in 1980.

The two other papers which have been submitted to the Committee are: "The Interrelationship of the Medical Profession and the Public" by Odin W. Anderson, Ph.D., University of Chicago; and "Future Physician Manpower Needs" by Grant Osborne, Ph.D., American Medical Association.


3 a.m.
Sleep-interfering anxiety and tension can usually be relieved with
EQUANIL®
(meprobamate) Wyeth



Cautions: Carefully supervise dose and amounts prescribed, especially for patients prone to overdose themselves. Excessive prolonged use may result in dependence or habituation in susceptible persons—as ex-addicts, alcoholics, severe psychoneurotics. After prolonged high dosage, drug should be withdrawn gradually to avoid possibly severe withdrawal reactions including epileptiform seizures. Side effects include drowsiness and, rarely, allergic or idiosyncratic reactions. These reactions, sometimes severe, can develop in patients receiving only 1 to 4 doses who have had no previous contact with meprobamate. Mild reactions are characterized by urticarial or erythematous maculopapular rash. Acute non-thrombocytopenic purpura with petechiae, ecchymoses, peripheral edema and fever have been reported. Meprobamate should be stopped and not reinstituted. Severe reactions, observed very rarely, include angioneurotic edema, bronchial spasms, fever, fainting spells, hypotensive crises (1 fatal case), anaphylaxis, stomatitis and proctitis (1 case) and hyperthermia. Warn patients of possible reduced alcohol tolerance. Should drowsiness, ataxia, or visual disturbances occur, dose should be reduced. If symptoms persist, patients should not operate vehicles or dangerous machinery. A few cases of leukopenia, usually transient, have been reported following prolonged dosage. Other blood dyscrasias—aplastic anemia (1 fatal case), thrombocytopenic purpura, agranulocytosis and hemolytic anemia—have occurred rarely, almost always in the presence of known toxic agents. One fatal case of bullous dermatitis following intermittent use of meprobamate with prednisolone has been reported. Prescribe very cautiously for patients with suicidal tendencies. Suicidal attempts should be treated with immediate gastric lavage and appropriate supportive therapy.

Contraindications: History of sensitivity to meprobamate.

Composition: Tablets, 200 mg. and 400 mg. meprobamate. Coated Tablets, Wyseals® Equanil (meprobamate) 400 mg. Continuous-Release Capsules, Equanil L-A (meprobamate) 400 mg.

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opposition of organized medicine and the insurance industry, the 1965 Social Security Amendments created a compulsory federal hospital insurance program for the aged plus an elective supplementary health insurance program.

Today we are on the threshold of a new era. The health insurance benefits for the aged under Social Security are about to be implemented. We cannot know for certain what the ultimate effects will be. In addition, a wide range of health benefits are provided for under Title XIX of Public Law 89-97. It may well be that these grants provided to states for medical assistance programs will have an even more profound effect on health insurance and the medical profession than the health insurance benefits for the aged.

RISING EXPECTATIONS. Before looking to the future, what other forces are at work today? Perhaps the most significant factor is the rising level of expectations in the health care field. Higher levels of education, rising incomes resulting from prolonged prosperity and more rapid and widespread dissemination of medical news resulting from modern communications media have combined to raise the expectations of the public.[11] A more enlightened public now demands assurances of high quality care. Many persons who once approached their physician with child-like faith now report fully armed with a self-diagnosis and a demand that the latest wonder drug reported in some eminent "medical journal" such as *Reader's Digest* be prescribed for their symptons.

The Johnson Administration, as a major part of its program for a Great Society, has emphasized health aspects of the War on Poverty and several special health programs, including the regional program on heart disease, cancer and stroke (Public Law 89-239). In turn, the government and more enlightened consumer groups, especially unions, have increasingly called for quality controls. In the wake of several studies which have documented instances of unnecessary surgical procedures and other abuses,[12] these groups are progressively less willing to accept the long-held position of the medical profession that it alone is capable of judging the quality of health care. Increasingly, third parties are becoming involved in setting standards. Insurers, partly on their own initiative and partly under pressure from unions, are beginning to assert themselves on questions of quality as well as cost. They are taking the position that an obligation exists not only adequately to cover health care costs but also to assure that the coverage is providing first class care for the money spent.

ONE OF THE BOLDEST steps taken to date has been the firm stand adopted by Blue Cross in several jurisdictions to refuse to contract with certain hospitals.

The most celebrated instance occurred in Michigan, where the Macomb County Circuit Court upheld the right of Michigan Hospital Service to refuse to contract with the Samaritan Hospital Association after the Association had expanded its facilities in defiance of the recommendations of an areawide planning council. The planning group had ruled that adequate beds already existed in the area. The Michigan Supreme Court, by refusing to hear an appeal of the lower court's decision in June, 1963, gave added force to the ruling. This action has great significance, since excessive building of high cost units can be a major element in increasing health care costs.

Unfortunately, the states are not always so cooperative. In Alabama, for example, Blue Cross must contract with any licensed hospital. Many states have had similar legislation introduced. The recently passed Folsom Act in New York, on the other hand, tends to support the Michigan position.

After many years of cooperation between organized medicine and the health insurance industry, there is frequently some reluctance on the part of insurers to "rock the boat," but caught in the middle between the consumer, government and the purveyors of care, there have been signs that the old order will soon change. The often repeated claim of medicine that Americans enjoy the best health care in the world is simply inadequate to quiet critics. Regardless of the futility, at times, of

Rising levels of expectations a new factor

Quality control standards to be set — soon

international statistical comparisons, the position of the United States in terms of such items as life expectancy and infant mortality, to name only two areas, is such that it becomes difficult to maintain that all Americans enjoy top quality care, though many undoubtedly do.

WHILE IT IS ADMITTEDLY extremely difficult to establish standards by which to judge the quality of medical care, and perhaps even more difficult to apply the standards once they have been set, there is no longer any doubt that some standards will be set — soon. The widespread existence of tissue committees is one example of quality control. Many hospital utilization committees have also formed in recent years, and they, too, provide some impact on quality. For the most part, unfortunately, the medical profession has been something less than a driving force — at least in the eyes of the public — in the quest for quality. Utilization and review committees vary markedly in their effectiveness and have been virtually non-existent in many regions.

The vocal and adamant objections of many physicians to allowing non-professionals a voice in judging quality of care have not provided good public relations. The public is often unaware of and/or unimpressed by existing programs to insure quality, including accreditation of medical schools, excellent postgraduate programs, plentiful high quality professional journals, high level scientific meetings and others. In fact, control of medical school accreditation has sometimes been used against medicine by those who accuse it of self-seeking, monopolistic control of entry designed to enhance an already favorable economic position. Any realistic appraisal must recognize that the existing controls have been something less than an overwhelming success. By their voluntary nature, they have been unable to keep a busy profession abreast of all the scientific changes of recent years. It has been suggested that periodic licensing might spur more doctors to keep current than the present pattern of lifetime licensing.

Another aspect of the rising expectations of the public in the health care field is the increasing demand for comprehensive insurance coverage. Probably the most widespread attack on insurance industry statistics dealing with the number of insureds rests on the assertion that many persons have pitifully inadequate protection despite the fact that they are counted for statistical purposes as an insured individual. The early emphasis on hospital benefits was undoubtedly based in large part on the correct conviction that hospitalization was both unpredictable and expensive and therefore well-suited to an insurance solution. We now know that the majority of all medical expenses are unpredictable, that most illnesses which formerly required hospitalization can now be treated on an out-patient basis, and that the drugs and other services required as an out-patient can also represent "shock losses" amenable to insurance coverage.

FURTHERMORE, OUR ENTIRE population has become so "installment oriented" with respect to other aspects of their lives that many see no good reason for acting differently with respect to health care costs. Theoretical arguments on the "true nature of insurance" and the purely economic advantage — which does exist — of not insuring certain small and fairly predictable costs carry little weight with the individual who is willing to pay a premium for the convenience of certainty. This, after all, is another cornerstone of the insurance industry, and to many it is far more persuasive than the "large-loss principle" which is used to justify deductibles.

There exists today an almost universal recognition of this growing demand for comprehensive coverage. Virtually every major labor spokesman has gone on record on the subject, and the same can be said for most industry and government leaders. Most members of the health care professions also recognize the demand and are sympathetic to it. Any reservations which exist are founded mainly on fears concerning potential repercussions on the organization and control of health care services in this country. Comprehensive coverage has been made available by most insurers for several years, though the broadest benefits available are not always purchased.

At present, much of the pressure for more comprehensive coverage is centered on benefits for treatment of mental disorders. This is clearly a result of such important factors as President Kennedy's interest in mental health, the recommendations of the NIMH and the recently successful negotiations of the UAW with the automobile industry. There is also agitation for more widespread coverage for dental treatment and prescription drugs in addition to a general broadening of other existing benefits. It is difficult to foretell the end result of these pressures, but at least one study determined that more coverage and not complete coverage is the goal of the great majority of the public.[13] It should also be noted that nearly 50,000,000 Americans are already covered under major medical contracts, many of which have routinely paid some benefits for mental illness and prescription drugs for years.

RISING COSTS. The all too familiar story of rapidly rising costs in the health care field need not be belabored in this discussion. Suffice it to say that since World War II the price of health care has risen much more than the level of prices in general. Indeed, the price spiral is thought by many to be the major underlying factor which made possible the recent massive entry of the federal government into the health insurance field.

The entire health insurance industry has been concerned with this problem, not only as a result of mounting pressure from consumer groups, notably unions and employers, but also because it recognized the threat of governmental intervention if so essential a service as health care became too expensive for many to afford. Health professionals, too, have expressed their concern.

A variety of techniques have been used in attempting to meet this problem. Medical society review committees, mentioned before, have been one tool employed. Encouraged by commercial health insurers both individually and through the Health Insurance Council, sponsored by local medical societies and bolstered by official endorsement of the American Medical Association, these committees have done much to educate both physicians and insurers on the matter of costs. The committees are viewed primarily as an educational effort by their backers, but despite enthusiastic support from insurers and much of organized medicine, many physicians still view review committees as an unwarranted third-party intrusion into the physician-patient relationship. This attitude sometimes prevents formation of a review committee; other times it makes an existing committee ineffective. At their best, however, they have been helpful in many localities.

"Overutilization" is an ill-defined and emotion-evoking term which frequently has been used in explaining rising health care costs. Among the techniques used to combat this alleged evil are deductible and percentage participation (co-insurance) clauses in insurance and prepayment plans and utilization review committees in hospitals. The effectiveness of policy provisions in affecting utilization has never really been established,[14] but they probably have some value. Utilization review committees, a relatively recent development, add a new dimension to the traditional hospital medical staff responsibility. This new dimension may be noted as a statement of principle in the August, 1963, Bulletin of the Joint Commission on Accreditation of Hospitals:

> "2. Evaluate the quality of medical care on the basis of documented evidence to support diagnosis, treatment, *and justified utilization of hospital facilities;"* (Emphasis added)

This statement was approved in 1960 by the Board of Trustees of the AMA and the AHA. These committees can be effective.

FURTHER RECOGNITION of the importance of these committees came with the adoption by the AMA House of Delegates, in 1964, of the following excerpt from the conclusions and recommendations of the Commission on the Cost of Medical Care:

> Inasmuch as the judicious use of hospital facilities by the public and physicians is essential to the efficient and economic functioning of the prepayment and voluntary health insurance sys-

(Continued on Page 41)

Utilization review committees add new dimensions

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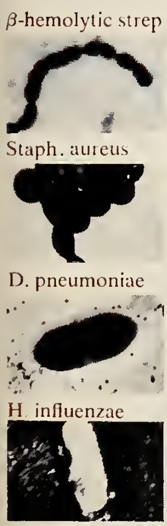
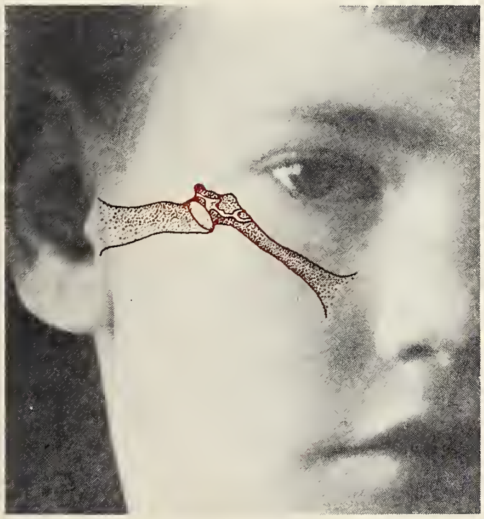
proven effectiveness against major U.R.I. pathogens including beta-hemolytic strep

With Gantanol (sulfamethoxazole), bacteriologic conversion rates for beta-hemolytic streptococci are comparable to those generally seen with penicillin, and apparently superior to those cited in the literature for erythromycin and the broad-spectrum antibiotics.[1,2] With conversion rates ranging from a high of 96% in 229 patients[2] and 98% in 96 cases[3] to 65% in 105 cases,[5,6] Gantanol (sulfamethoxazole) Suspension is an effective alternative therapy in patients sensitive to penicillin, the drug of choice in known beta-hemolytic streptococcal infections.

In addition to this effectiveness against beta-hemolytic streptococci,[1-9] bacteriologic conversion rates have averaged 69% for *D. pneumoniae* (103 of 150 patients),[3,6,7] 78% for *H. influenzae* (42 of 54 patients),[3,4,7] and 67% for *Staph. aureus* (76 of 113 patients).[3,4,6,7] It is this wide spectrum of activity which makes Gantanol (sulfamethoxazole) Suspension a good choice in acute pharyngitis, tonsillitis and otitis media.





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Over 8 out of 10 U.R.I. patients—87% of 2231 patients—showed an excellent to satisfactory clinical response to Gantanol (sulfamethoxazole).[1-13] Such favorable results are even more meaningful in view of the fact that only 1.1% of the more than 2000 cases cited discontinued therapy because of side effects. Of the total side effects reported (4.6%), most were mild and included rash, urticaria, itching, dizziness, headache, diarrhea, nausea and vomiting, shivering sensation, skin discoloration and crystalluria.[1-13]

Before prescribing, please consult complete product information, a summary of which follows:

Indications: Acute and chronic respiratory and urinary tract bacterial infections due to susceptible microorganisms. At present penicillin is considered the drug of choice in acute group A beta-hemolytic streptococcal infections; however, Gantanol (sulfamethoxazole) has shown an effectiveness approaching that of penicillin in a large number of patients. If employed in such infections, *it is important that therapy be continued at the usual recommended dosage for a period of at least 10 days.*

Contraindicated in sulfonamide-sensitive patients, pregnant females at term, premature infants or infants during first 3 months of life.

Warnings: Use only after critical appraisal in patients with liver damage, renal damage, urinary obstruction or blood dyscrasias. If toxic or hypersensitivity reactions or blood dyscrasias occur, discontinue therapy. In intermittent or prolonged therapy, blood counts and liver and kidney function tests should be performed. Data insufficient on prolonged or recurrent therapy in chronic renal diseases of children.

Precautions: Observe usual sulfonamide therapy precautions, including maintenance of an adequate fluid intake. Use with caution in patients with histories of allergies and/or asthma. Patients with impaired renal function should be followed closely since renal impairment may cause excessive drug accumulation. Occasional failures may occur due to resistant microorganisms. Not effective in virus or rickettsial infections.

Adverse Reactions: Following may occur: headache, nausea, vomiting, urticaria, diarrhea, hepatitis, pancreatitis, blood dyscrasias, neuropathy, drug fever, Stevens-Johnson syndrome, skin rash, injection of the conjunctiva and sclera, petechiae, purpura, hematuria and crystalluria.

Dosage: Children—1 teasp./20 lbs initially, followed by ½ teasp./20 lbs b.i.d. *Adults*—4 teasp. initially, followed by 2 teasp. b.i.d. or t.i.d., depending upon severity of infection.

How Supplied: Suspension 10%, 0.5 Gm sulfamethoxazole/5 cc teasp., cherry-flavored, bottles of 16 oz.

References: 1. Braden, B.; Colmore, J. P., and Cummings, M. M.: Antimicrobial Agents Annual—1960, p. 54. 2. Alban, J.: *Am. J. Dis. Child.*, *109*:304, 1965. 3. Elia, J. C.: *Eye Ear Nose & Throat Month.*, *41*:722, 1962. 4. Carter, C. H.: *Clin. Med.*, *71*:1571, 1964. 5. Jackson, H.; Cooper, J.; Mellinger, W. J., and Olsen, A. R.: *Southwestern Med.*, *44*:246, 1963. 6. Reichelderfer, T. E.: *Clin. Med.*, *71*:1045, 1964. 7. Peters, J. H.: Scientific Exhibit presented at the Spring Meeting of the American Academy of Pediatrics, April 26-29, 1965. 8. Peters, J. H.: Antimicrobial Agents and Chemotherapy—1961, p. 406. 9. Braden, B., and Colmore, J. P.: *J. Oklahoma M. A.*, *57*:7, 1964. 10. Chastain, P. J.: *J. Florida M. A.*, *48*:816, 1962. 11. Grater, W. C.: *Antibiotics & Chemother.*, *12*:450, 1962. 12. Exline, A. L.: *Colorado GP*, *5*:(5), 11, 1963. 13. Patton, J. M.: *West. Med.*, *5*:46, 1964.

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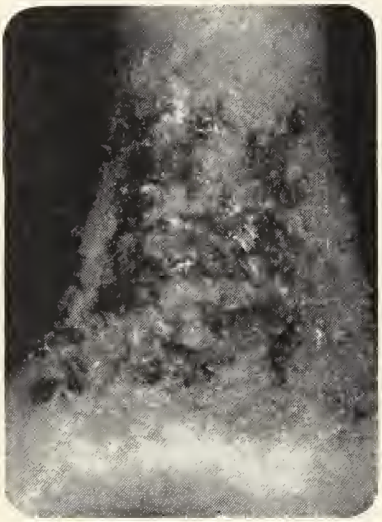
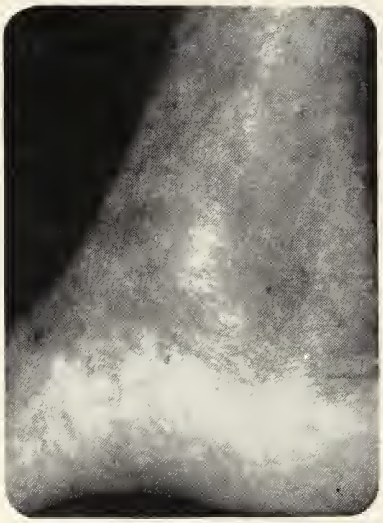


Before treatment



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Administration and Dosage: Apply sparingly to the affected area 3 or 4 times daily. Some cases of psoriasis may be more effectively treated if the 0.1% Cream or Ointment is applied under an occlusive dressing.

Contraindications: Tuberculosis of the skin, herpes simplex, chicken pox and vaccinia.

Precautions and Side Effects: Do not use in the eyes or in the ear (if drum is perforated). A few individuals react unfavorably under certain conditions. If side effects are encountered, the drug should be discontinued and appropriate measures taken. Use on infected areas should be attended with caution and observation, bearing in mind the potential spreading of infection and the advisability of discontinuing therapy and/or initiating antibacterial measures. Generalized dermatological conditions may require systemic corticosteroid therapy. Steroid therapy, although responsible for remissions of dermatoses, especially of allergic origin cannot be expected to prevent recurrence. The use over extensive body areas, with or without occlusive nonpermeable dressings, may result in systemic absorption. Appropriate precautions should be taken. When occlusive nonpermeable dressings are used, miliaria, folliculitis and pyodermas will sometimes develop. Localized atrophy and striae have been reported with the use of steroids by the occlusive technique. When occlusive nonpermeable dressings are used, the physician should be aware of the hazards of suffocation and flammability. The safety of use on pregnant patients has not been firmly established. Thus, do not use in large amounts or for long periods of time on pregnant patients.

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tems, the state and local medical societies should urge and assist the medical staffs of hospitals to form hospital utilization committees.

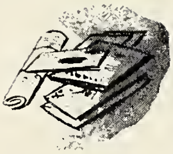
Now, of course, such committees have been made mandatory for those facilities wanting to participate in the health insurance program for the elderly under Social Security.

Relative value studies represent another important approach which has developed to provide guidance in establishing physicians' fees on a more orderly and logical basis. This approach, widely endorsed by insurers, has been put forth primarily by the medical profession itself. Originated in California in the early 1950's, this approach has been used in many states and by several national medical specialty groups. These studies are not fee schedules, but they may be used to establish a fee schedule, a fact that has made them repugnant to much of the medical world. Perhaps the greatest value of an RVS is that when carefully constructed it can provide a reasonable and logical basis for relating the values of various professional procedures. This, in turn, is thought to have a tempering impact on fees, even though different "conversion factors" are used by different physicians. At least one state medical association has adopted a relative *fee* schedule for one category of patients,[15] but the great majority shun any suggestion of setting fees as opposed to relative values.

THE AMA EVIDENCED interest in relative values with the creation of its Committee on Medical Practices in 1955, but actions since that time reveal a consistent preference for local or regional studies rather than one on a national level. One step forward has been endorsement of national uniformity of nomenclature and coding — an important prerequisite to a workable RVS. In the spring of 1965, a special AMA Staff Task Force on Relative Value Studies strongly urged the development by the AMA of a national RVS, but no such action has been endorsed to date.

The National Association of Blue Shield Plans (NABSP) gave strong support to the RVS concept with the development several years ago of its Professional Services Index. Initial use was centered in national accounts and government welfare programs, but this was soon expanded.

In another development, insurers introduced the concept of "usual and customary" fees in conjunction with the development of major medical policies. The two-fold purpose of this concept was to enable commercial insurers to provide service benefits and to provide some control over claims that were clearly out of line. This approach has not been free of problems, but it has been generally successful. In 1965 the NABSP joined the approach with the introduction of its Prevailing Fees Program. This, in effect, is a refinement which enables the carrier to determine in advance what the "usual and customary" fees will be. This is obviously a tremendous advantage in calculating premiums or enrollment fees. It also marks attainment by Blue Shield of an ability to provide paid-in-full benefits to subscribers without regard to traditional income limitations.



The "usual and customary" approach has generally been more palatable to the medical profession than fixed fee schedules, but it has been called inflationary by some observers. In practice, it works best in conjunction with a medical society review committee which effectively identifies unusual fees. A majority of existing review committees examine only those fees that are appealed by patients or insurers, but some committees have a regular procedure which includes spot checks of fees that have not been appealed. The latter approach is clearly more effective.

MANY OTHER PROGRAMS to control costs have been attempted, with varying degrees of success. Important among these have been the concentrated efforts to minimize the "system operating costs" of insurance and prepayment. This includes not only the normal operating expenses of the carriers, but also attendant expenses to physicians, insureds, and others, such as completing claims forms. The carriers have done a remarkable job, for the most part, in reducing overhead costs. The Health Insurance Council and the AMA's Committee on Insurance and Prepayment Plans have devoted much time and effort to simplifying claims forms for over a decade, and considerable progress has been made in correcting the chaotic situation that once existed. Blue Cross and Blue Shield have also improved their claim forms. Continued efforts will minimize the impact of claims handling costs on health care prices.

SUPPLY AND DEMAND. The supply and demand of health care services is one of the burning issues of the day. Will Medicare create an excessive demand for available hospital and nursing home beds? Do we have enough physicians? Are enough trained personnel available to provide home health services that are specified in the act? Will the psychiatric services which are contracted for in the UAW contract with the automobile manufacturers actually be available? How will these matters affect prices and insurance rates? These are but a few of the many questions to be answered. If supply is found to be wanting, who is responsible? How can the situation be improved?

The federal government, of course, has been concerned with the supply of health facilities for many years, most notably through the Hill-Burton Act. Since its inception in 1946, this program has provided millions to help construct hospitals, nursing homes and other health facilities. More recently, it has emphasized modernization of existing facilities and development of areawide planning agencies for coordination of existing and planned health facilities and services.

Until recently, federal aid was limited almost exclusively to "bricks and mortar" projects, with the medical profession leading the struggle to limit government funds to this field. To bolster its argument against the need for scholarship funds, the AMA could point to its established and extensive loan program through the AMA-ERF. Despite these efforts, the Health Professions Educational Assistance Act was passed in 1963 and broadened in 1965. This act, in addition to providing further incentives for improving facilities, established a student loan program and, in the 1965 amendments, a scholarship program for medical, dental, optometry, podiatry and pharmacy students.

At this time, three more Administration sponsored bills are pending before Congress—the Allied Health Professions Personnel Training Act of 1966, the Comprehensive Health Planning and Public Health Service Amendments of 1966, and the Hospital and Medical Facilities Modernization Amendments of 1966. The titles of these bills are sufficient evidence of the continued and growing concern with the supply of health facilities and personnel.

Of course, there has been a great deal of involvement at the state and local levels of government as well. There has also been much non-governmental activity, with unions, industry and health insurers actively supporting such matters as regional planning.

A LOOK TO THE FUTURE

This brief glance at the recent past and present of health insurance, prepayment and medicine gives evidence of great change and considerable controversy. Perhaps the only really safe prediction for the future is for more of the same.

The health insurance industry seems to be at a three-way fork in the road. Furthermore, it is doubtful that it is the complete master of its own fate, for it seems that the destiny of private health insurance in this country is intimately related to the actions of several other groups. Medicine and government, of course, will play an important role, but labor and industry, as primary spokesmen for the consumer, will also wield great influence.

In 1985, we may view a healthy, virile private health insurance industry of giant proportions which effectively serves the health needs of the vast majority of the under-65 population of the country, with an assist from government to provide for a relatively small group of medically indigent. The present government health insurance for the elderly, greatly revised and expanded, will be an accepted part of the American scene.

A second vision of 1985 reveals a stunted health insurance industry, in today's terms, with carriers having relinquished most of their risk-bearing ca-

Health insurance industry at three-way fork in road

Efforts coming to cover chronic disorders, rehabilitation

pacity, except for supplementary benefits, in order to serve as administrative "buffer" between medicine and a comprehensive, population-wide system of federal health insurance.

A third view contemplates a completely government sponsored and administered health insurance system for the entire population, with a relatively small but possibly thriving private industry offering supplementary benefits to most of the population, plus alternative benefits to that limited proportion of the population that is willing to pay extra for presumably better, more prompt and more personal medical care.

The arguments supporting these three alternative long range predictions can be examined more profitably after initial examination of some intervening developments which can be viewed with virtual certainty.

BROADER BENEFITS. There is absolutely no question that health insurance and prepayment plans of the future will provide more extensive benefits than they do today. In addition to more generous coverage of presently insured services, such as hospitalization and surgery, benefits will be extended into many areas that today enjoy only minimal and/or experimental coverage.

This statement requires no crystal ball. The history of the voluntary health insurance industry is one of expanding benefits. Important brakes on this development have been reluctance by carriers to offer benefits in the absence of adequate controls and the question of priorities in the expenditures of scarce dollars by those who most effectively express consumer demand. This expression has come primarily from labor unions acting through collective bargaining sessions. Clearly, labor approaches these sessions with a variety of goals which encompass many areas other than health. The objectives in the health field, then, are subject to the relative urgency of other matters as well as the absolute limit on the funds available at any given time.

IT HAS BEEN SAID that "the problem in America is primarily ongoing care for chronic disorders of the middle-aged and older persons, rehabilitation of those handicapped as a result of accident and disease, and restoration of persons suffering from mental illness."[16] The UAW has in recent years been a leader in fighting for better health care and health care coverage. The basic position of this union was spelled out by the 19th UAW Constitutional Convention in Atlantic City, New Jersey, in March, 1964, which resolved to " . . . promote enactment of medically advanced and economically sound national health programs which will make comprehensive, high quality medical care available to all residents . . . regardless of their incomes or economic status."

Not waiting for such ambitious goals to be achieved, however, the UAW forced a major development when it won extensive inpatient and out-of-hospital mental health benefits from the major automobile manufacturers in the 1964 contract negotiations. These benefits, to be implemented in mid-1966, attracted nationwide attention and focused on one of the few areas of health care which currently escapes the blanket indictment of "overutilization." There have been, of course, instances where benefits for psychiatric treatment have been badly abused, but this has not been uniformly true. Though substantial benefits for mental disorders have been available through various other programs, especially group major medical contracts, this major development will undoubtedly be recorded as a significant turning point.

Among other things, it spawned concentrated efforts by the American Psychiatric Association to solve some of the definitional problems which have plagued this field in the past.[17] Additional developments in insuring mental disorders are sure to be forthcoming.

Having won this major advance in coverage for mental disorders, we can now expect the UAW to exert increased efforts to improve coverage for chronic disorders and rehabilitation.

ANOTHER IMMINENT DEVELOPMENT is the wide-scale provision of benefits for dental care. Considerable progress already has been made, especially in the development of prepayment dental service plans analagous to the Blue Shield movement. Most of this development has been recent, however, and only a small percentage of the population currently enjoys any dental coverage. The announcement by President Johnson in early April, 1966, of plans for a national dental care program for children will certainly give a push to this development.

The major question right now appears to be whether separate insurance and prepayment plans for dental care will continue to develop and thrive or if dental coverage will be absorbed as part of a single comprehensive package for health care. The latter development seems most logical in the long run, barring extensive government entry of the field.

We can expect great pressure in the future for increased preventive medical benefits, such as physical examinations. This will be challenging to the insurance industry and medicine alike. There is widespread belief in the logical assumption that regular physical examinations can eliminate many health problems, but there is also evidence available which casts doubt on the efficacy of regular physical examinations, at least as presently conducted.[18]

THE CHALLENGE TO medicine is clear.

It must adapt to a role which has been greatly revised by its own success in conquering infectious disease and must learn effectively to spot potential malfunctions in the human machine before they occur. Insurers must develop a satisfactory approach to provide meaningful preventive medical benefits, a largely neglected item at present.

Perhaps the most treacherous area of development lies in the realm of coverage for prescription —and possibly some non-prescription—drugs. These benefits are readily subject to abuse and have represented a major difficulty in most instances in which they have been provided, especially under government programs. It is certain, however, that broader benefits in this area will become available. Success will demand ingenuity and efficiency of the carriers and great integrity on the part of physicians and patients alike.

Without going into an exhaustive cataloguing of potential developments, it must be noted that changes are inevitable in the modalities of treatment which will be covered as well as in the types of illness. That is, in addition to increased emphasis on chronic diseases, rehabilitative services and preventive medical benefits, new modes of treatment will be insured. Nursing home benefits, for example, are a relatively recent development, and they have been extremely limited. With the advent of health insurance benefits for the aged under Social Security, nursing home benefits have been thrust into prominence. The same can be said for certain post-hospital extended care services and home health services. The UAW contract noted previously provides coverage for mental health treatment in such varied settings as community mental health centers, day and night care centers (partial hospitalization) or other group treatment facilities.

Parenthetically, it may be noted that some of these facilities were virtually nonexistent at the time the contract was negotiated and even the eventual operational structure was not clear. This same contract also includes benefits for outpatient services of para-medical personnel such as psychiatric social workers and psychologists. Definitional standards for these two groups were also absent at the time of the agreement. More developments of this sort can be expected as the demand for health care services continues to grow and as efforts are made to maximize the output and efficiency of our limited supply of health care facilities and personnel.

MORE RESEARCH ON CONTROLS. The health insurance industry is likely to spend much energy and money during the next two decades in research designed to measure the effectiveness of various controls on the utilization of health care services. The government will also be interested in this question, as will the medical profession and the general public. Insurers have always utilized

CLIP AND SAVE. Because this look into the future will have many uses the Publication Committee suggests you may wish to remove it from the journal and file it. The article appears on consecutive pages to facilitate filing for reference and continuing study.

various internal and external controls to protect themselves from disastrous underwriting results. So long as they continue their risk-bearing function they will retain this interest. Because of increasing social and political pressures as well as industry competition, some traditional controls are less effective than in the past, and they will continue to decline in importance. With increasing pressure to make insurance available to the entire population, there will be less opportunity to reject applicants because of their present state of health. There will also be greater efforts to eliminate exclusions or limitations in coverage for preexisting conditions.

Some controls such as "actively-at-work" provisions in group insurance policies will probably be retained, but the fate of deductible and percentage participation clauses, long a bulwark of defense — especially to commercial health insurers — is problematical. It has already been pointed out that their efficacy in limiting utilization has never really been established. The important thing to consider is the present position of those in the industry who have for years argued the merits of these provisions. The need of the deductible "to eliminate small nuisance claims" and the percentage participation clause "to give the insured a continuing interest in recovery" have seldom been questioned within commercial insurance ranks.

Many of the individuals and companies that have maintained this position are now on the brink of mass hypocrisy — or a deliberate attempt to sabotage the government health insurance program for the elderly. Of the plans already announced to "supplement" the insurance for the elderly under parts A and B of Public Law 89-97 (and thus maintain a voluntary insurance foothold among the elderly), many are specifically designed to fill in the initial deductible and to pay the 20 per cent share which was to have been paid by the individual. In so doing, the companies are (1) underwriting the same small losses of less than $50 that have been deemed "nuisance claims" or "budgetable expenses" in the past, and (2) removing the "continuing financial interest of the insured" from the government program. It may also be noted that testimony offered during congressional hearings on this bill gave evidence that some reliance was being placed on these provisions to control utilization, and their inclusion was influenced by testimony of the insurance industry as to their desirability.[19]

Can it be that insurers never really believed their own claims about the need for these controls, or is it conceivable that they hope the government plan will fail and have developed supplementary benefits deliberately designed to "bleed" the program?

Or is it simply a last-ditch attempt to retain a share of the over-65 market?

REGARDLESS OF THEIR motivation, it is unlikely that they will be able to continue selling these provisions to other segments of the insured population on grounds other than that they hold down claim costs and premiums — facts that cannot be refuted. Furthermore, serious efforts to measure their actual impact on utilization can be expected. The "Blues," of course, are offering similar supplemental benefits, but their position has always favored first-dollar protection, and their deviations have been based more on competitive pressure than on philosophy. In fact, they argued against deductible provisions in the act. In fairness, it should be noted that some major commercial insurers have retired from the over-65 market rather than act contrary to their convictions in this matter, while several others never supported deductibles on other than purely financial grounds.

The Medicare program has also given renewed impetus to development of such controls as hospital utilization committees and review committees. Where they already exist, they will be strengthened and will extend their operation to the government program. The applicable provisions of the legislation make their immediate and widespread development in other areas inevitable. Obviously, in these new areas they will not serve only the government program. Once in being, they will also be used to evaluate claims under other policies. The value of these committees as controls will be

What is the fate of deductible clauses?

carefully evaluated, as will the development of various area-wide planning facilities. The latter will also be judged on the relative merits of voluntary and compulsory compliance.

FURTHER STUDY of the relative value approach as a control on medical fees can also be anticipated. In fact, a national relative value schedule seems inevitable before another decade passes. It is extremely unlikely, however, that a national relative fee schedule will be adopted. Such a fee schedule could never reflect geographical differences in costs and would be impractical, but the logic of a relative value schedule which could utilize various conversion factors to meet changing conditions is irrefutable. The possibility does exist, however, of conversion factors being applied which are fixed in a given area but which vary between areas.

This, clearly, would result in a series of relative fee schedules and would differ markedly from the contemplated national RVS. From the standpoint of physicians, a national RVS would certainly be more desirable, because it would allow more flexibility.

The final determination of this issue probably rests with the attitude of the medical profession. If, as has been assumed, a national RVS is inevitable, the real issue to be decided is who develops it. The AMA seems to be the logical candidate, but its involvement will require a marked change in existing policy favoring local relative value studies. Barring prompt and active leadership by medicine, some other agency will fill the void. As noted, Blue Shield, via its prevailing fee program, is already moving in this direction. Commercial insurers and the government could also do the job.

In fact, the government has already been a prime force in the development of national relative value studies by certain medical specialty groups.[20] Furthermore, in administering the Medicare program for dependents of servicemen, the government has frequently used the existing California RVS as a guide on a national basis. Commercial insurers have, for the most part, been supporters of the relative value concept, though individual companies have varied greatly from enthusiastic endorsement to outright opposition. Some companies have developed their own relative fee schedules and others have spent vast amounts of money in keying their computerized claims machinery to this type of system.

ANY ORGANIZATION, be it governmental or private, that has access to modern electronic data processing equipment and a block of claims experience accumulated under a program providing reimbursement for "reasonable and customary" fees can develop a fee schedule with ease and dispatch. It might not be perfectly accurate, and it is unlikely that it would be satisfactory to all physicians, but it could undoubtedly be enforced for purposes of satisfying claims against insurers. Dissatisfied physicians would then have to recover additional charges directly from their patients. This might be difficult if such charges have already been judged unreasonable by a reputable insurer. Time is growing extremely short if medicine is to remain captain of the ship in this vital area.

Aside from the methods mentioned above, there will be continuing efforts to discover means of effectively controlling both the cost and utilization of health care facilities and services. In the continuing assault on costs, we can expect to see even more attempts to provide coverage for alternative, but lower cost treatment. Examples include providing nursing home benefits and home health services as alternatives to hospitalization, and benefits for treatment by psychiatric social workers and psychologists as well as physicians. Each time alternatives are introduced, however, new problems develop in establishing standards of service and control of utilization.[21] It is in these latter areas that insurers face the most challenging task, and it is here that they will need the most guidance and assistance from health professionals.

THE ULTIMATE CONCERN, of course, is not with restricting utilization of needed services, but with limiting overutilization or unnecessary utilization which places excessive demands on our

National RVS inevitable before 1977

Overutilization, underutilization in for more attention

limited supply of services, thus driving up prices and making it difficult for those in real need to obtain treatment. The magnitude of the task becomes apparent when it is recognized that no really effective definition of what constitutes overutilization exists. Except for flagrant instances, this continues to be a question that can only be answered by studying the individual case.

Before leaving this subject, it must be made clear that underutilization of services and facilities will also become a far more important concern in the future. In establishing utilization committees under PL 89-97, Congress made it clear that responsibility for identifying inadequate treatment is as important as locating insurances of excessive or unnecessary care.

AWARENESS AND INVOLVEMENT. The future of health insurance and the practice of medicine as they are known today is inescapably tied to the degree of awareness of each to the changing conditions of the times and the involvement of each in guiding the evolutionary changes which are forthcoming.

It has been said of voluntary health insurers that they:

> ". . . base their activities on the concept of voluntary insurance as an aid to people in paying for certain health services. Being solely concerned with economic aspects of health services, these organizations expect, or hope, that high standards of care will be assured by some other agency, such as the hospitals, and by the bodies representing the professionals involved."[22]

The same observer states that, "Another school of thought maintains that the device of insurance must be adapted to the particular requirements of personal health service rather than used as a financial mechanism only . . . ," and must "assume responsibility for maintenance of high standards as well as organized payment through pooling of risks and resources." There is no longer room for doubt or delay — the latter school of thought must prevail.

THAT INSURERS ARE recognizing this mandate is clear. For example, Walter McNerney, President of the Blue Cross Association, has stated that one of the functions of a carrier should be, "Development of controls over costs and utilization, such as standards for participating hospitals and constant review of admissions, services and stays against established standards."[23] A recent feature article entitled, "Medicine's New Policeman: Blue Cross,"[24] sheds further light on what the future holds. John M. Cotton, M.D., former president of the Medical Society of the County of New York, was quoted in the article as follows:

> "Medicine in America is in for some rude shocks. Not within the next decade or two, but within the next year or two. It's going to be a new experience to practice medicine with someone looking over your shoulder, but it's here now. And it's clear that any hospital that does not have an acceptable audit unit two or three years from now is not going to receive any funds either from government or from health insurance organizations."

The author goes on to observe that:

> "With or without Government-subsidized care — with or without Blue Cross in the role of fiscal go-between — the billion dollar health insurance industry is writing more of the rules for medicine. And for Blue Cross in particular, looking over the doctor's shoulder involves more than just the area of his practice that involves Federal subsidies.

But Blue Cross is not alone in assuming a "watchdog" role. The article also quotes former Michigan Insurance Commissioner Allen L. Mayerson as insisting on more controls, and W. Benson Harer, M.D., Director of Medical Affairs for Blue Cross of Greater Philadelphia, notes that big business is pushing Blue Cross toward more controls.

Commercial insurers also have evidenced their concern. In 1965 an extensive study by a special committee of the Health Insurance Association of America on the subject of "Health Insurance and the Effectiveness of Health Care" was completed. The HIAA is an organization representing companies that produce over 90 per cent of commercial health insurance volume. The study, as yet unpublished, may ultimately serve as the basis for an industry policy statement and recommendations. It considered the potential activities of the health insurance industry in promoting effective health care through responsible action in fourteen separate areas, including such diverse subjects as the organization of health care services, supply and distribution of personnel and facilities, health insurance benefit patterns, pricing practices, and review and utilization committees.

NEARLY ALL ATTEMPTS by insurers to move toward greater involvement in standards and controls have been extremely cautious and tentative in the early stages. While recognizing the need for involvement, carriers have been reluctant to forfeit the hard won goodwill and friendship of the profession — a product of years of cultivation. Despite their caution, however, they frequently meet with instant antagonism at the slightest suggestion that they work together with physicians on these matters. Since insurers are now struggling for their own survival, however, they are likely to carry a big stick from now on, even if they can still manage to speak softly.

It surprises no one that the initial reaction of much of the medical world to third party involvement — regardless of the identity of the third party — has been hostile. This is evidenced in many ways, including the frequently measurable loss of "referrals" by physicians who are active in medical society sponsored review and disciplinary committees. There are, of course, many leaders in the medical profession who clearly recognize the responsibility of medicine both to be involved and to accept involvement in the years ahead. The future of health insurance and medicine rests largely on the ability of these leaders to win the cooperation of the entire profession. Hopefully, this can be accomplished.

For example, after years of a no-compromise, fight-to-the-death attitude on Medicare, the AMA, in what has been termed by some the "Appel turnover,"* has actively participated in the work of several technical advisory committees. These were formed after the law was passed in order to develop the necessary administrative rules and guidelines for implementing the legislation. This same cooperative posture enabled the AMA to negotiate for substantial modifications in the original DeBakey commission recommendations for regional health centers.

AS ANYONE WHO HAS ever attempted to shoot rapids in a canoe can attest, however, the only way to maintain control of the craft is to move faster than the current. How long can physicians and insurers remain in control while negotiating the rapids of medical socio-economic change that is sweeping the nation if they continue to react rather than act?

To lead, it is not necessary to completely forsake a basically conservative heritage, but it will be necessary to become attuned to the temper of the times and to guide rather than follow developments in a better educated, more affluent and more socially sensitive society. If the proper leadership posture is assumed, and a more positive image is projected, it may still be possible to satisfy both the conservative traditions of medicine and insurance and the legitimate demands of consumers.

The alternative, in all probability, is a social reformer's delight, with massive change for the sake of change, but without proper evaluation of the consequences and, possibly, with the forfeiture of valuable traditions.

One constructive suggestion that has been offered is that physicians, hopefully at the request of management and labor, become more actively involved in the pattern-setting benefit negotiations of collective bargaining sessions. It has been pointed out that these parties are dealing with limited national resources, and:

> . . . those who sit at the bargaining table have a responsibility to determine in advance the

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* In recognition of James Z. Appel, M.D., then President of the AMA.

(Continued on Page 53)

winter 1966

DORSEY Season

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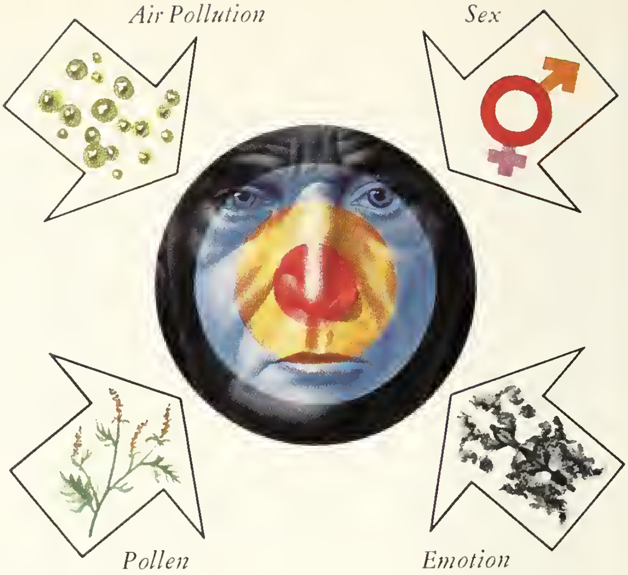
this issue: the nose as a shock organ

the nose as a shock organ

by Charles J. Shagoury, M.D., Chelmsford, Massachusetts



"Is it a cold, hay fever, or has he been reprimanded by his boss?" Occasionally, you will ask yourself this question when confronted by a patient with abrupt onset of rhinorrhea, nasal obstruction, and sneezing. Usually the history will elucidate the problem, but examination of the nose will often provide valuable clues to the correct diagnosis.

The nose is a shock organ in a double sense. First, it is in the nose that the confrontation takes place with the surrounding atmosphere. For twenty-four hours a day, the nose must meet the varying challenges of the inspired air, containing perhaps noxious chemicals, dust, dirt, bacteria, viruses, fungi, and industrial pollutants of all kinds, and render it clean, virtually sterile, and fit for the sensitive alveoli of the lungs. Whatever the temperature or humidity of the atmosphere, the nose must transmit it to the lungs at approximately 98°F, and with a humidity of approximately 40%.[1]

Second, in particularly susceptible patients, the nose acts as a shock organ in a manner totally unrelated to its normal function. Persons with hay fever respond to ordinarily harmless materials by extreme nasal congestion, with marked rhinorrhea and violent spasms of sneezing. In some patients, exposure to threatening or disagreeable agents, or situations involving mental conflict may result in a reaction which is exclusively nasal, with swelling of the turbinates, and marked hypersecretion.[2]

Nasal symptoms usually result when the nose seeks to perform its function of getting rid of noxious and dangerous elements in the atmosphere, and prevent their admission to the trachea and lungs. Small particles are removed by the mucous coating which blankets the nasal passages. This mucous blanket contains a bacteriostatic agent, lysozyme, which destroys most air-borne bacteria.[3] The mucinous content renders the surface sticky, causing dusts and small particles to adhere. It has been postulated that this process is rendered more effective through adsorption because of a surface electrical charge on the nasal mucosa.[4] The cilia then sweep the particulate matter to the pharynx. The nose can prevent entrance into the lungs of particles as small as three microns in diameter, but smaller particles elude the nasal barrier. Most bacteria causing respiratory infections are one to three microns in diameter, but since they usually are inhaled in clumps, they are efficiently removed as a rule. Viruses, which are of the order of 1/1000 of this size, are less efficiently dealt with, unless they occur in very large aggregates.[5]

The nose will react in a more or less similar manner, whatever the nature of the offending agent, whether it be an irritant chemical, virus, pollen, or distasteful emotional situation. In acute coryza, the most characteristic sign is a profuse watery discharge. The volume of secretion may rise from practically nothing to nearly 60cc in twenty-four hours.[6] The mucous membrane is reddened and engorged, while the turbinates are markedly swollen. After the first day or two, the secretion becomes thicker, yellowish, and more difficult to expel. The surface cells are largely destroyed, contributing to the copious discharge, which now also contains numerous inflammatory cells which have migrated to the area. Gradually, over a period of a few days, or a week, the flood abates, the swelling and redness subside, and the nasal epithelium resumes a healthy appearance.

Repeated attacks of rhinitis, particularly if there is an underlying element of obstruction, may result in chronic rhinitis. The mucous membrane is constantly swollen and reddened. Sticky, mucopurulent secretions are a continuous feature, and the glandular elements are hypertrophied. Commonly, the mucosal surface takes on an irregular, rounded "mulberry" appearance, and nasal passages are occluded by the swollen turbinates and redundant mucosa.

While all of us are susceptible to colds, the victim of hay fever, or allergic rhinitis, displays a marked nasal reaction to materials in the air which leave his associates unaffected. In such a patient, the nasal mucosa has become an allergic "shock" organ. Contact with the nasal allergen causes local release of histamine, with vasodilatation, increased vascular permeability, and severe nasal congestion, similar to the "wheal" and "flare" reactions in the skin, when the epidermis is the allergic shock organ. While we eagerly await the coming of spring, the hay fever sufferer dreads the blooming season, whose invisible pollens are poisons to his sensitive nose. His neighbor's cat or dog may provoke paroxysms of uncontrollable sneezing. In some cases a specific allergen is not identified, but the triad of rhinorrhea, nasal obstruction, and sneezing is present.[7] The nose in these cases shows a pale, boggy, edematous mucosa, with a thin mucoid secretion. The mucous membrane shows extreme retractility to 1% cocaine or ephedrine. If the patient has medicated himself prior to examination, the nasal passages may appear abnormally patent, or show exaggerated congestion due to rebound reaction. The secretion may show a large number of eosinophils particularly after an attack of sneezing or rhinorrhea. Touching the mucosal surface, especially of the inferior turbinate, leaves an indentation, showing that the swelling is due to stasis and edema, rather than actual hyperplasia of the mucous membrane as in chronic hypertrophic rhinitis. Though the pale swollen mucosa is the hallmark of allergic rhinitis, as usually seen by the physician, exposure of allergic subjects to their known allergens results in a brief hyperemic phase, followed by pallor and edema.[8]

In the later stages of allergic rhinitis, the chronic edema of the mucous membrane results in the formation of polyps, clusters of grape-like masses hanging from the roof of the nose, with a pale glistening surface, contributing significantly to the sense of nasal obstruction and oppression.

A large group of patients show symptoms of nasal congestion when confronted by adverse life situations.[9] In these unfortunate persons, anxiety, frustration, and resentment are often accompanied by a runny nose and nasal obstruction. Lacrimation adds to the nasal stuffiness. This autonomic response, mediated by the parasympathetic nervous system, may be part of a general parasympathetic reaction, or may possibly represent in part, a symbolic effort to wash out and crowd out the offending situation.

Nasal congestion may also occur in some patients at times of sexual stimulation, and in women during menstruation and pregnancy, even to the point of epistaxis.[10] The relationship is obscure; castration results in atrophy of the nasal glands, and their action is inhibited by the hormones of the hypophysis and the thyroid.[11] The nose may be the shock organ in drug therapy. The nose may also bear the brunt of industrial stress, in those who work in a hot dry atmosphere, or those exposed to acid fumes, or irritating dusts. As the air in our cities is increasingly polluted by exhaust fumes, and industrial irritants, whole urban populations may suffer from chronic nasal and respiratory symptoms.

Of course, nasal reactions are not just infectious, or allergic, or emotional. Particularly in the chronic sufferers, there is an interdependence of all three. Death of a relative, or other psychic shock can pre-

(concluded on following page)

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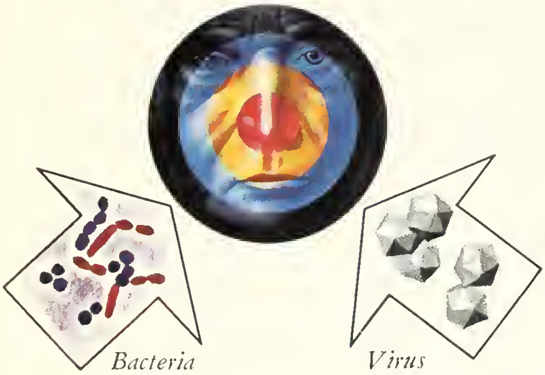
cipitate an attack of rhinorrhea in hay fever sufferers.[12] Others develop attacks of vasomotor rhinitis following change in temperature, chilling, or exposure to the sun, or simply warm bedclothes.

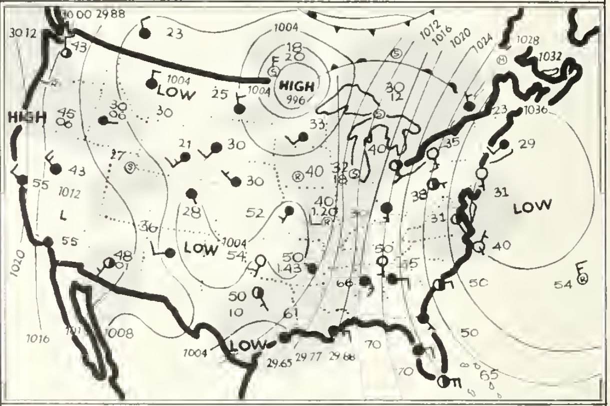


The complex interplay of allergy and infection is largely unclear. Allergy to the viruses and bacteria which cause infection has been postulated, but is difficult to demonstrate. The swollen obstructed allergic nose is more susceptible to infection. At the same time, infection often precedes or precipitates an allergic attack. Exposure of a susceptible patient to an allergen can activate latent virus organisms leading to infection.[13] This "jolt" reaction represents a summation of an allergen and a virus leading to symptoms in the nose as a shock organ, which neither could have produced alone. In childhood, repeated attacks of bronchitis and colds may be inflammatory reactions to an allergen, or precipitated by exposure to an allergen. These children may later develop typical allergic rhinitis. On the other hand, children with typical allergic histories, eczema, asthma, and allergic familial backgrounds, may later develop typical infectious rhinopathies. Skin tests in such patients are usually positive.

Nasal reactions are part of the systemic response of the patient to an unwelcome stimulus. In cases of respiratory infection and exposure to atmospheric irritants, the reactions are useful, and to some extent desirable. They are usually self-limited, disappearing within a few days, or upon removal of the provoking agent. Here the distressing symptoms can be ameliorated with appropriate decongestant agents, or, in the case of severe or complicated respiratory infections, antibiotics may be given, with reasonable confidence of a cure. On the other hand, when nasal reactions are the peculiar response of an individual to an allergen, or to an undesirable situation, they serve no useful purpose. The nose here is a shock organ in a stressful situation, but can furnish no response of value. It merely causes the patient symptoms which add to his problems. In these cases, symptomatic treatment is of great benefit, but often the underlying faulty pattern of response cannot be altered. Such a patient may literally be considered to be paying his way in life "through the nose."

references 1. Maures, E. R., Mendez, F. C., Jr., and Hilsinger, R. C.: Importance of the Nose in Filtering and Humidifying Inspired Air. Ohio State Med. J. 61:41-42. 2. Holmes, T.,Goodell H., Wolf, S., and Wolff, H. G.: The Nose. Springfield, Ill. 1950 Charles C. Thomas p. 10 ff. 3. Boies, L. H. R.: Fundamentals of Otolaryngology. Phila. W. B. Saunders Co. 1954 p. 160. 4. Proetz, A. W.: Applied Physiology of the Nose. St. Louis 1941 Zimmerman-Petty Co. p. 6. 5. Spikard, A.: The Common Cold, A Survey. Disease of the Chest 48:545-49. Nov. 1965. 6. Ibid. 7. Bourdial, J.:Role of Allergy in Upper Respiratory Tract Infection. Europa Med. Paris 4:75-80 1965. 8. Holmes, et al. The Nose p. 22. 9. Ibid. p. 320. 10. Proetz, A. W. op. cit. p. 321. 11. Ibid. p. 320. 12. Rees, Linford J.: Physiogenic and Psychogenic Factors in Vasomotor Rhinitis. J. Psychosomatic Research 8:101 Sept. 1964. 13. Horesh, A. J.: Allergy and Infection. An Allergy 23:621-35 Dec. 1965.

Weather Forecast Throughout the Nation



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effect of their actions. It would seem advantageous that they seek responsible professional opinion in the public interest.

> Consultation is available from most local medical societies or the state or national medical associations for opinions on these matters. I am quite aware that professional opinion was sought on the mental health aspects of the UAW contract, and I am pleased to know that this occurred. I do not know whether the broader problem of health resource availability for the greatly expanded benefits was explored. I would urge that when any group finds itself in discussions which will markedly affect the national patterns of health care broad consultation be sought from those who must deliver the services. Such consultation will in most instances go beyond the third parties involved and must include the providers.[25]

This suggestion is certainly logically sound, and it could be beneficial to everyone so long as the professional consultation which is made available is both competent and forward looking. Medicine, if offered this opportunity, must not allow itself to use its consultant's role as a tool of obstruction.

NEITHER THE MEDICAL profession nor the health insurance industry has been enthusiastic over the slow but steady growth of closed panel prepayment health plans over the past two decades. Organized medicine, in fact, was openly belligerent until an adverse legal decision forced reluctant recognition. Even today, there are many within the profession who are barely tolerant of their closed panel colleagues, despite an official AMA resolution affirming their acceptability if the patient has a free choice between the closed panel and the usual fee-for-service practice.[26]

The AMA standard, in this instance, is essentially the same as that of labor, though with a completely different emphasis. Much of organized labor has taken a firm position in insisting on a "dual choice" program of health benefits offering both closed panel prepayment and the customary insurance program.[27] What the AMA reluctantly accepts, however, labor enthusiastically advocates.

In coming years, the growth of these plans is likely to accelerate. They represent a major alternative organization of medical services, one with peculiar advantages in such matters as built in cost and quality control. Various other alternatives for the organization and delivery of medical and health services will also emerge. One of the best appraisals of this situation was offered in 1965:

> Often on interviews, doctors tell me that they believe medicine of the future will be similar to that of the group practice service plans. I do not believe this. I think there will always be the fee-for-service private care, the indemnity plans, the service plans, and others yet unborn. Each has its advantages and its weaknesses, and in the competition that will always be present, each will develop its potential strengths and strengthen its areas of weakness.[28]

If this observation is accurate, insurers and physicians alike have little to fear so long as they stay aware of the environmental climate and stay involved in projecting the advantages and correcting the weaknesses of the system they favor.

THE PAST AS PROLOGUE. Part of the awareness demanded of physicians and insurers must be concentrated on actions of the government. Now that government, via Medicare, has taken its first massive step into the health field outside of the realm of welfare medicine and environmental health control (such as water supply, sewage disposal, pure food and drug laws, etc.), what will the future hold? Recent American history reveals only one piece of social legislation which was reversed — prohibition. The special characteristics present in that case do not appear to be present in the health field.

For years, the AMA and others argued that Medicare for the elderly would merely be a foot in the door toward the eventual socialization of medicine. In fact, some proponents of the legislation made the same claim, though for political

Physician involvement in collective bargaining logical

reasons it was generally denied at the time the bill was being considered. The same threat, of course, faces the health insurance industry. Is this an idle fear? Hardly. The history of the social security system in the United States, as in other countries, is one of continual expansion. The most recent and comparable example is the growth of disability benefits.

THE FIRST RECOGNITION of disability under our Social Security law came with what someone has described as a "modest waiver of premium benefit" which was enacted in 1954. Commonly known as the disability drop out period, it allowed elimination of up to five years of reduced earnings resulting from disability when calculating average earnings to determine benefit amounts. Two years later, in 1956, a disability income benefit was introduced for permanently disabled workers over age 50. In the next decade, the program went through a succession of changes which: (1) eliminated the age limit, making the benefit available to all insureds; (2) eliminated the offset provisions with state workmen's compensation laws (thus making it possible, in most states, for disabled workers to collect more in benefits than they had earned prior to their disability — this has since been corrected); (3) eliminated the necessity of permanent disability. Thus, today, cash benefits for both temporary and permanent disability are available to all covered workers and their dependents.

The first step into the health field under the social security law is of considerably greater magnitude than was the first step into the disability field. There are many who feel that future progress will also be more rapid. The Chairman of the Senate Finance Committee, Russell Long, speaking on the future of Social Security, has said that, "In the next two years we will continue to increase the payments, continue to expand the program. It's inevitable that Medicare will be extended to cover practically everybody — young and old. The next group will be the disabled."[29]

Raymond L. White, M.D., consultant to the AMA, is among those who disagree:

> ". . . I do not agree with those who believe that the socialization of medicine or of a Social Security System of medical care for the entire population of the nation is necessary or even inevitable. I believe that the health care system of the nation may be able to adapt itself to the massive new programs under the present legislation of Title XVIII and XIX, if guided and developed along paths which are sensitive to our national philosophy as individuals who want to be treated as individuals and as health professionals who recognize that outside influences can result in a lowering of the quality of health care for individuals. The task is not easy now nor will it become easier, but the answer lies not in obstructionism nor in a clamor to "go all the way." An old medical axiom is to apply some "Tincture of Time." This would seem appropriate at this point in our history.[30]

The view of Senator Long surely is greeted enthusiastically by labor, since it coincides with objectives previously documented. Dr. White, on the other hand, probably expresses the hopes, if not the convictions of the majority of medicine, management and the insurance industry.

A PREDICTION. It helps, in forecasting, to suppress personal prejudice and bias in order to look at the future objectively — difficult though this may be. What follows, therefore, does not necessarily reflect preference so much as expectation.

What, then, of the three "visions" of 1985 which were suggested earlier? The first view contemplated a "healthy, virile private health insurance industry of giant proportions which effectively serves the health needs of the vast majority of the under-65 population of the country, with a relatively minor assist from government to provide for a small group of medically indigent." This view included a government health insurance plan still limited to the elderly, though greatly revised and expanded. At the risk of dismissing too lightly the

Time running out for insurance industry

Government-sponsored insurance system for all by 1985

resiliency and determination of an industry that has frequently been underestimated in the past, this vision is rejected. The primary reason for this rejection is the time element.

The revolution of expectations in the field of health developed too rapidly for the insurance industry adequately to cope with them, despite heroic efforts. If time could be bought, private insurers would undoubtedly meet the challenges inherent in this first vision. But faced with the snowballing political attraction of a government sponsored program, lingering resistance of the medical profession to necessary controls and involvement and pressure from organized labor for a government sponsored solution, it seems impossible that private insurance can prevail on such a broad scale.

Only an unforeseen delay occasioned by serious domestic economic problems or excessive military expenditures could buy the insurance industry sufficient time for this vision to be realized, barring excessive costs or abuse of the program itself.

The second vision was a "stunted health insurance industry, in today's terms, with carriers having relinquished most of their risk-bearing capacity, except for supplementary benefits, in order to serve as administrative 'buffer' between medicine and a comprehensive, population-wide system of federal health insurance."

THE FINAL VIEW "contemplates a completely government sponsored and administered health insurance system for the entire population, with a relatively small but possibly thriving private industry offering supplementary benefits to most of the population plus alternative benefits to that limited proportion of the population that is willing to pay extra for presumably better, more prompt and more personal medical care." This last vision is merely a reflection of the English experience today.

The most probable result will be a combination of these two visions. Others have discussed the "mixed economy" that is emerging in America and have suggested that it describes the future of voluntary prepayment for health services:

> As I move to the question of what form a "mixed economy" in the health field is likely to take, I should like to point out that the greatest stumbling block to realistic appraisal and prediction has been removed. When we consider health prepayment as an "either-or" situation — either governmental or private — we overlook the particular genius of American politics and economics to find compromise solutions to matters of acute public concern. I venture one firm prediction at the outset: there will be no revolution in the structure of payment for health care. Rather, the evolutionary process of the last few decades will continue, implemented and encouraged by increased governmental concern and participation.[31]

One distinction between revolution and evolution is the time required for the change. The reader may select the label, but change there will be.

The potpourri of health benefits in 1985 will unquestionably include a government sponsored health insurance system for the entire population. While there is a distinct possibility that such a plan would be completely administered by the government, present indications are that an "administrative buffer" between government and the providers of care will be retained. Several precedents already exist for this arrangement, and their continued success plus the active efforts of Blue Cross and others to obtain an administrative intermediary capacity seem destined to preserve this function. There are many factors favoring such a solution, including the existence of an experienced mechanism and the often politically expedient situation of having a third party stand between government and consumer.

In one sense, then, the health insurance industry as we know it today will be stunted. It is highly unlikely that private carriers will have any risk-bearing capacity so far as the governmental program of health and medical benefits is concerned, but dollar volume of the private health insurance industry may well exceed that of today. This will be due in part to the continued offering of sup-

(Continued on Page 58)

fluocinolone acetonide — an original steroid from
SYNTEX
LABORATORIES INC., PALO ALTO, CALIF.

controls infected inflammatory dermatoses that start from scratch

The "itch-scratch" cycle usually associated with inflammation often results in infected dermatoses because broken skin surfaces are particularly vulnerable to pathogenic bacteria.[1] To treat infected inflammatory dermatoses, Neo-Synalar Cream combines the most active topical corticosteroid with a highly reliable antibiotic generally reserved for topical application.

In Neo-Synalar, fluocinoline acetonide controls the inflammation and provides rapid relief from associated pruritus. At the same time, its antibacterial component—neomycin—combats superficial infection caused by many gram-positive and gram-negative bacilli[2] that often colonize and thrive on abraded skin.[1]

A specially formulated vanishing cream base that is greaseless and odor free makes Neo-Synalar cosmetically appealing, and encourages greater patient cooperation.

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controls the infection

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stops the scratch

Contraindications: Tuberculous, fungal, and most viral lesions of the skin (including herpes simplex, vaccinia, and varicella). Not for ophthalmic use. Contraindicated in individuals with a history of hypersensitivity to any of its components. **Precautions:** Neomycin rarely produces allergic reactions. Prolonged use of any antibiotic may result in overgrowth of nonsusceptible organisms; if this occurs, appropriate therapy should be instituted. Where severe local infection or systemic infection exists, the use of systemic antibiotics should be considered, based on susceptibility testing. While topical steroids have not been reported to have an adverse effect on pregnancy, the safety of their use on pregnant females has not absolutely been established. Therefore, they should not be used extensively on pregnant patients, in large amounts, or for prolonged periods of time. **Side Effects:** Side effects are not ordinarily encountered with topical corticosteroids. As with all drugs, however, a few patients may react unfavorably to Neo-Synalar under certain conditions. **Availability:** Neo-Synalar Cream (0.025% fluocinolone acetonide, neomycin sulfate, equivalent to 0.35% neomycin base), 5 and 15 Gm. tubes.

Neo-Synalar®
uocinolone acetonide-neomycin sulfate cream)
Cream

References: 1. Pillsbury, D. M., Shelley, W. B., and Kligman, A. M.: A manual of cutaneous medicine, Philadelphia, Saunders, 1961, p. 79. **2.** Barber, M., and Garrod, L. P.: Antibiotic and chemotherapy, Baltimore, Williams and Wilkins, 1963, p. 111.

plemental health and medical benefits, population growth, and rising prices.

OF GREATER SIGNIFICANCE, though, will be the tremendous growth which will have occurred in the fifth major area of health insurance — income replacement. As of 1966, income replacement insurance was the smallest of the five major categories of health insurance, despite the fact that some insurance leaders have long considered it the most promising venture for private insurers.

What of the disability provisions of the Social Security law and the four state compulsory temporary disability laws?[32] These statutory benefits are likely to remain nominal, and should have no more effect on private disability income insurance plans than the survivorship and retirement benefits of Social Security have had on the life insurance industry. In the latter case, it is generally conceded that the government benefits have spurred rather than hindered the private industry. The critical issue here is that statutory benefits must remain nominal, for there are important differences between life and disability income insurance. The marketable maximums in the case of the latter one, of course, are far more limited than in the case of life insurance, and only gainfully employed persons are insurable.

Income replacement insurance holds several advantages for private insurers. Aside from eliminating the service versus indemnity controversy, it permits far more accurate loss projections and thus simplifies the pricing problem. Furthermore, insurers can combat the inroads of inflation by merely selling larger benefits, rather than having to squabble with insureds and/or providers of care over increased costs of services. Though a moral hazard remains in the person of the malingerer, the occasional exposure to unethical inflation of charges because of the existence of insurance is eliminated.

Even before the passage of Medicare, many insurers had recognized the attractive aspects of income replacement coverage, and others have been touting its advantages as a supplement to the service benefits provided in the law. With this increased attention, it should prove to be an extremely marketable product. It probably holds the key to continued existence and prosperity of the private health insurance industry.

DOES THIS MEAN THAT regular hospital and medical benefits as we know them today will no longer be available? Probably not. A national health insurance program for all under Social Security could take any one of several forms, ranging from nominal basic protection through a major medical umbrella, which covers all catastrophic losses, to a comprehensive plan providing nearly complete coverage for everyone.

By 1985, the national program in the U.S. should be quite comprehensive, with benefits extending to fairly lengthy hospital stays and high dollar amounts of other services. The supplemental policies of private carriers will provide for "niceties" such as private rooms and should also cover some extended benefits beyond those provided by the government. One popular form of supplementary benefit will probably be a flat daily indemnity for each day of hospitalization. Under this plan, the insured will be able to use the extra cash in any way he sees fit.

PRESENT INDICATIONS are that medicine will not be socialized in the same sense as under the British National Health Service. Assuming an adequate supply of health manpower and facilities, the government will probably avoid a head-on clash with organized medicine. If the various control mechanisms which have been discussed prove effective, it undoubtedly will continue to pay for the "reasonable cost of services," based on a national RVS or some equivalent approach, and physicans are unlikely to be given a quota of patients or reimbursed on a capitation basis.

Because some physician will not want to cooperate with the government plan, and because there are those who want the best, as they visualize it, a limited but thriving market will continue for a few companies that desire to offer alternative benefits to the government plan. The British experience has demonstrated that there are always some persons who are willing to pay extra for that quality, convenience and personal attention which they feel is unavailable through the government program.

SUMMARY

Be it evolution or revolution, the health insurance industry and medicine face drastic changes in the next two decades. For medicine, the most painful adjustment will be the imposition of many "third party" controls and the active involvement of lay persons and non-physician professionals in setting standards and evaluating programs and services. The extent of this involvement and its repugnance can be limited through an immediate and enlightened awakening of the profession. Only active leadership based on an informed awareness of changing socio-economic conditions and increased medical expectations of the public can retain for physicians a reasonable semblance of their current independence. Assuming that this leadership is forthcoming, the future development of social health legislation can be both professionally and politically palatable.

For the insurance industry, the short run will witness many changes including extensive broadening of benefits, greater involvement in medical affairs and stepped-up research on controls.

IN THE LONGER RUN, it is, of course, inconceivable that the bulk of the population will stand for benefits less extensive than those provided the elderly under Medicare. For reasons already discussed, it is inevitable that the government soon will take over the role of insurer for the bulk of the direct health insurance benefits for the entire population. At most, this transition will consume ten years.

The expanded role of government, however, by no means pretends the demise of the private health insurance industry. Through involvement as fiscal or administrative intermediary and provider of supplementary benefits, including luxury care costs and substitute benefits for the affluent, the industry will continue to be involved.

Its brightest future, however, lies in the field of income replacement insurance.

In this field, a relatively untapped market awaits development, and the sky is the limit.

BIBLIOGRAPHY

1. See Galdston, Iago, M.D. *Medicine in Transition.* Chicago: University of Chicago Press, 1965.
2. For more detail, see Somers, Herman M. and Somers, Anne R. *Doctors, Patients & Health Insurance.* Washington, D.C.: The Brookings Institution, 1961, especially CH. 15.
3. See also, Reed, Louis S. *Blue Cross and Medical Service Plans.* Washington, D.C.: Public Health Service, 1947.
4. Somers & Somers, *Op. cit.*, esp. Ch. 14.
5. The landmark case was *Inland Steel Company v. United Steelworkers of America* (C.I.O.), 77 NLRB 4 (1948), which dealt with pensions, but actions against General Motors Corp. and W. W. Cross extended the concept to insurance benefits.
6. For a more complete discussion of the history of health insurance, see Follmann, J. F., Jr. *Medical Care and Health Insurance.* Homewood, Illinois: Richard D. Irwin, 1963. Especially pages 105-116.
7. *Source Book of Health Insurance Data, 1965.* New York: Health Insurance Institute. These figures are thought to be overstated by some, but the error, if any, is not likely to be large, and the records are continuous so that they provide a basis for comparison over time.
8. *Ibid.*
9. These studies have been reported on by industry sources, government agencies and private organizations, such as the Health Insurance Foundation and the National Opinion Research Center. The *HIF Research Series* and *Progress in Health Services* have been particularly good.
10. "Health Insurance Industry" from here on will be used as a generic term to include commercial insurers and prepayment plans, except when noted to the contrary.
11. Anderson, Odin W., Colette, Patricia, Feldman, Jacob J. *Changes in Family Medical Care Expenditures and Voluntary Health Insurance.* Cambridge, Mass.: Harvard University Press, 1963, Ch. VII. A definite relationship is reported between high expenditure families and those with high levels of income and education.

12. Columbia University. *The Quantity, Quality and Costs of Medical and Hospital of "Teamster Families" in New York Area.* Report based on household interviews and medical audit of hospital records. Prepared for the Teamsters Joint Council Number 16 and Management Hospital Trust Fund by Columbia University, Ray E. Trussell, project director. Dec., 1961, 82 pp. and 34 tables, mimeographed. This is probably the most widely publicized critique of current medical quality.

13. Anderson, Odin W. and Staff. *Voluntary Health Insurance in Two Cities.* Health Insurance Foundation – National Opinion Research Center, 1957. p. 43.

14. Hall, Charles P., Jr. "Deductibles in Health Insurance: An Evaluation." *The Journal of Risk and Insurance.* To be published.

15. *Michigan Uniform Fee Schedule for Government Wel-Fare Agencies.* Revised December, 1964, effective August 30, 1965. Michigan State Medical Society, East Lansing, Michigan.

16. Glasser, Melvin A., Director, Social Security Department, UAW. 1965 Blue Shield Annual Program Conference, Chicago, Illinois. October 25-26, 1965, p. 36.

17. American Psychiatric Association. *APA Guidelines for Psychiatric Services Covered Under Health Insurance Plans.* Washington, D.C., 1966. See also, Hall, Charles P., Jr., "Mental Disorders and Health Insurance." *The American Journal of Psychiatry.* Vol. 122, No. 9 (March, 1966) pp. 1021-1027.

18. Schor, Stanley S. et al. "An Evaluation of the Periodic Health Examination – The Findings in 350 Examinees Who Died." *Annals of Internal Medicine.* Vol. 61, No. 6 (December, 1964). See also, Schor, Stanley S., et al., "An Evaluation of the Periodic Health Examination: A study of Factors Discriminating Between Survival and Death from Coronary Heart Disease." *Annals of Internal Medicine.* Vol. 61, No. 6 (December, 1964). Refer also to unpublished discussions at Breakfast Roundtable on Periodic Health Examinations, AMA Clinical Convention, Philadelphia, Pennsylvania, December 1, 1965.

19. Hearings before the Committee on Ways and Means, House of Representatives, 88th Congress, First and Second Sessions on H.R. 3920, Part 2, November 21-22, 1963, pp. 385-386. Also, "The Status of the Social Security Program and Recommendations for its Improvement." *Report of the Advisory Committee on Social Security,* Washington, D.C., 1965, p. 40. Hearings before the Committee on Finance, United States Senate, 89th Congress, First Session, on H.R. 6675. Part 2, May 10-14, 17-19, 1965. pp. 567-568, 731, 819, 838, 1065, 1125, 1222. Other references are also available.

20. The College of American Pathologists and the American College of Radiology, for example, both developed their RVS at the request of the government (Other reasons may also have been present.)

21. For an excellent discussion of these problems in just one area, see Follman, J. F., Jr., "Health Insurance and Home Care Programs," Paper presented before the Institute on Hospital-Based Home Care Programs, Princeton, New Jersey, December 14, 1965.

22. Goldmann, Franz, M.D. "Which Way Voluntary Health Insurance?" *New England Journal of Medicine.* Vol. 272, No. 14 (April 8, 1965), p. 723.

23. McNerney, W. J. "The Future of Voluntary Prepayment for Health Services." *New England Journal of Medicine.* 273:907-914 (October 21), 1965.

24. Smith, Carlton. "Medicine's New Policeman: Blue Cross." *Medical Economics,* November 1, 1965, p. 92-105.

25. White, Raymond L., M.D. "Social Insurance and Employee Benefits: The Role of the AMA." Address before the National Insurance Management Conference of the American Society of Insurance Management, Houston, Texas. February 17, 1966.

26. American Medical Association. *Judicial Council Opinions and Reports,* 1966, p. 4-5.

27. See, for example, "A Special Report on Your Union's Programs for Employment and Income Security," Twelfth Constitutional Convention, United Steelworkers of America, Atlantic City, New Jersey, September, 1964, pp. 25-28. Also, Greathouse, Pat, Vice President UAW (AFL-CIO). "Collective Bargaining and Group Health Plans." Presented to 14th Annual Group Health Institute, Minneapolis, Minnesota, May 14, 1964.

28. Kay, Raymond, M.D. "Perspectives and Potentials: The Future Course of Prepaid Medical Care: The Group Practice Plans." *Proceedings 1965 Group Health Institute.* Group Health Association of America and Group Health Foundation. Philadelphia, Pennsylvania, May 20-21, 1965. p. 7.

29. Long, Russell. *Quoted in Insurance Economics Surveys.* Insurance Economics Society of America. Chicago, Illinois. Vol. 22, No. 10. (April, 1966).

30. White, Raymond L., M.D., *op. cit.*

31. McNerney, W. J., *op. cit.*

32. California, New Jersey, New York, Rhode Island.

Alcoholism Education Project Underway Among Physicians and Public by MSMS Committee

A special MSMS program on Alcoholism Education which began in December, is being emphasized again during January.

Richard C. Bates, MD, Chairman of the Subcommittee on Alcoholism Education, reports that efforts to inform physicians and the public about alcoholism, its causes, diagnosis, and treatment, are being made. The plan includes workshops on alcoholism both for educating physicians and for social workers, teachers, ministers, police authorities, etc., with physicians' participation. Special radio and television programs on alcoholism will be broadcast.

A recent MAP Formula Program focused on alcoholism. It was "Formula for Self-Help," carried on WJIM-TV. Appearing on the program were Clayton K. Stroup, MD, Flint, chairman of the MSMS Committee on Alcoholism and Drug Addiction; and Ralph W. Daniel, Lansing, Chief of the Alcoholism Program with the Michigan Department of Public Health.

COUNTY MEDICAL SOCIETIES are urged to sponsor workshops, distribute pamphlets to schools, youth organizations, ministers, teachers, etc., and to offer speakers for school assemblies, clubs, classes, etc. They are urged to cooperate with local radio and television stations in programs on alcoholism and to show films and filmstrips to interested groups. The societies can cooperate with local newspapers by providing figures on alcoholism's toll in disease and accidents, emphasizing its effect on family relationships.

Individual physicians can play a special and a virtually independent role by taking on active, personal interest in diagnosing and treating alcoholics, points out Doctor Bates.

TOO, THEY CAN stimulate hospitals to provide staff training programs in alcoholism and facilities for treating alcoholics. Some physicians may wish to apply for one of the scholarships for special study in alcoholism, full information about which is featured in this issue of *Michigan Medicine.*

The alcoholism education program is a continuous one, so physicians should not feel limited to the months of December and January. Help and advice is sought not only during this concentrated effort, but throughout the year, stresses Doctor Bates.

February Issue Will Salute U-M Anniversary

The February issue of MICHIGAN MEDICINE will help celebrate the 150th birthday of the University of Michigan. Articles and illustrations recalling some of the historical landmarks of the Medical School will be featured.

A number of scientific articles by members of the faculty of the University of Michigan Medical Center will be published. One of these describes the use of a new anesthetic agent of great usefulness when quick recovery and minimal depression is required.

Other articles describe the use of enzyme techniques in medical diagnosis and the importance of recognizing lower urinary tract obstruction in children.

SAMA Picks Detroit

For the first time in the history of the organization, the Student American Medical Association will hold its National Convention for 1968 in Detroit.

Hosted by the Statler-Hilton Hotel, the conference will run from April 25-28.

The Wayne State University SAMA unit successfully bid for the convention in Detroit.

The First Place Plaque for competition among the 13 medical companies in the Ninth Naval District is received by Capt. Sidney Adler, M.D., right, from Capt. Thomas J. Canty, M.D., on behalf of Rear Adm. H. A. Yeager, commander of the Ninth Naval District.

Best Navy Program In Ninth District

Sidney Adler, M.D., Detroit, has been commended as the commanding officer of Naval Reserve Medical Company 9-5, whose outstanding performance won a first-place award among thirteen other medical companies of the Ninth Naval District.

According to the District Commandant, the progress of Dr. Adler's Division in attaining mobilization readiness was "exceptional," and its progress and achievement "was the result of an effective training program, a maximum recruiting effort and overall, dynamic leadership."

The First Place Plaque was awarded for permanent retention in recognition of the Company's readiness posture which, in the Commandant's words, "so greatly contributed to the total defense of the nation."

Doctor Adler, former president of Michigan Medical Service, is now a member of the MSMS Council.

Nuclear PG Course

A postgraduate course in Nuclear Medicine will be held February 1-3 at the University of Michigan, Ann Arbor.

STATE SMOKING-HEALTH COUNCIL PLANS FOUR-PRONGED ATTACK

A four-pronged 1967 educational program of the Michigan Council on Smoking and Health will be directed by Elizabeth L. Wheeler, Ph.D., Dr. P.H., Central Michigan University professor of health education, as Council Chairman for the second year.

The Council, which met Dec. 6 at MSMS, also selected as Vice-Chairman, George Pickett, M.D., Health Officer, Wayne County Health Department; and renamed as Secretary, John A. Doherty, Executive Director, Michigan Health Council.

Delegates from major health and educational organizations planned four state-wide activities during 1967-68.

(1) A conference January 18-20 at MSU sponsored by the United States Public Health Service on the implementation of smoking and health programs for health personnel.

(2) Workshops at major state universities and at professional conferences of educators, physicians, and health personnel.

(3) Revision of *Secondary Teachers Resource Guide on Smoking and Health Education* and development of a new *Teachers Resource Guide for Elementary School Teachers.*

(4) An adult education program for government workers and members of labor unions.

The MSMS representative to The Council, organized in 1963, is Henry J. VandenBerg, Jr., M.D., of Detroit.

DURING RECENT WEEKS Candy Richards was indeed a busy girl promoting the 1966 Christmas seal campaign. "We are most fortunate to have Candy Richards as our honorary campaign chairman," said Circuit Court Judge Alton H. Noe, Mt. Clemens, president of MTRDA. "She speaks from first hand knowledge of the disease tuberculosis, having had it when she was nine years of age. She has been an inspiration to the many people who heard her speak on radio and television, to those who read about her in their newspapers and especially to the patients she visited in our tuberculosis hospitals." Here she gives a stuffed toy to Fidel Martinez, at Muskegon's Northshore Hospital.

MARY S. CALDERONE, M.D., Executive Director of Sex Information and the Education Council of the United States, and W. G. Birch, M.D., Past President of the Kalamazoo Academy of Medicine, chat at the Kalamazoo Area Sex Education Committee Conference Dec. 13 at Western Michigan University. Dr. Calderone was guest speaker at the conference. (Photo from WMU)

Two New Men Join Judicial Commission

Two new members have been elected to the 10-member MSMS Judicial Commission by the membership. They are Robert F. Powers, M.D., Saginaw (District 4), and R. Wallace Teed, M.D., Ann Arbor (District 3).

Reelected were Louis J. Bailey, M.D., Southfield (District 1), and Carl B. Beeman, M.D., Grand Rapids (District 6).

Deadline for ballots in the election was December 1.

Remaining on the Commission are: Sherman E. Andrews, M.D., Kalamazoo (District 5); Wyman C. C. Cole, Sr., M.D., Detroit (District 1); Hugh M. Fuller, M.D., Detroit (District 1); Harold A. Furlong, M.D., Pontiac (District 2); Reader J. Hubbell, M.D., Traverse City (District 7); and Donald N. Sweeny, Jr., M.D., Detroit (District 1).

Aids Vietnamese

Through "Second Chance for Saigon Babies" many deprived Vietnamese children are now receiving medical help under the direction of a Detroit woman. She is Mrs. Lester Auberlin, president of World Medical Relief, and in 1964 the Michigan State Medical Society presented her one of its Individual Outstanding Health Service Awards for her contribution to world health.

Thyroid Seminar Jan. 25, WSU

The School of Medicine at Wayne State and the Detroit General Hospital will present the sixth annual Thyroid seminar in the Wayne County Medical Society auditorium, January 25.

Registration is at 9:00 a.m. and the first talk, "Hyperthyroidism and Myocardial Infarction: Incidence," by Myer Teitelbaum, M.D., is scheduled for 9:30. "Discordant Thyrogenic Heart Disease," by Robert Hamburg, M.D., "Spectrum of Autonomous Thyroid Function in Thyroid Nodules," by Joel I. Hamburger, M.D., and "Recognition of Coronary Artery Disease," by Richard J. Bing, M.D., are the other talks which will be given in the morning. All three men are from Wayne County.

At 1:15 p.m. Roger Greif, M.D., Professor of Medicine, Cornell University, will speak on "The Thyroid and the Heart."

The afternoon program also will include a "Seminar on the Clinical Aspects of the Thyroid and the Heart" and a clinical pathological conference.

The program is open to the entire medical community. General chairman is Nelson Taylor, M.D., Detroit.

FEATURED IN NEW SMITHSONIAN HALL

Two exhibits connected with Michigan medicine are on display at the newly-opened Hall of Medical Sciences at the Smithsonian Institution, according to Sami Hamarneh, Curator of the Division of Medical Sciences.

One of the exhibits illustrates the development of the electrocardiograph featuring the original equipment used by Frank N. Wilson, M.D., of Michigan. This gift was recommended to the Smithsonian by his friend, M. Lutfi Sadi, M.D., of Detroit.

The collection of laboratory apparatus from the University of Michigan, some of which belonged to Frederick G. Novy, M.D., is also exhibited. It is displayed in the period room representing a bacteriological research laboratory of the late 19th and early 20th centuries.

Citizens Group Supports MSU Med School Bid

The State Board of Education in December discussed the Michigan State University request for a full-fledged medical school at two meetings and likely will consider the question again at its regular meeting January 10-11.

The Citizens Committee for Health Care, appointed by the Board to study the request, urged expansion of the two-year program in a 49-page report made public in late November. The Committee proposal also included expansion of facilities at the University of Michigan and Wayne State University medical schools.

The MSMS Council and MSMS House of Delegates are on record as supporting a full degree-granting medical school at MSU.

The Board, deadlocked 4-4 on the MSU bid at its December 20 meeting, also directed its Bureau of Higher Education to study and make recommendations as soon as possible on what part the proposed Michigan College of Osteopathic Medicine should play in medical education in Michigan. The osteopaths appeared at the December Board meetings and pleaded that their plans also be reviewed. During 1966 the osteopaths sought on three different occasions to get approval directly from the Legislature for their school plans, but in all three cases they failed to get the necessary votes in the House of Representatives.

WMU Offers Italian Holiday Package

At 9:00 p.m. on March 4 an Alitalia jetliner will take off from Metropolitan airport in Detroit and arrive in Milan at 11:00 a.m. the following morning.

The tour will visit Milan, Venice, Padua, and the Italian Alps. Price adjustments will be made for those who want to make their own travel arrangements.

Further information is available from Dr. Gianfranco Dal Santo, 313/961-7302, ext. 458.

JOSEPH L. POSCH, M.D., Chairman of the 14th Annual Symposium on Trauma, greets Brock E. Brush, M.D., right, President of the Wayne County Medical Society, while John J. Coury, Jr., M.D., Port Huron, member of The MSMS Council, looks on. Dr. Coury was a guest speaker at the December 7 symposium attended by 550 physicians at the Wayne County Medical Society building.

Livingood Heads National Academy

Bal Harbour, Fla. — Clarence S. Livingood, M.D., Detroit, has been elected President of the American Academy of Dermatology — the world's largest organization of skin disease specialists. He succeeded Herman Beerman, M.D., Philadelphia, at the conclusion of the Academy's 25th Annual Session here, Dec. 8. Dr. Livingood, chief of dermatology at the Henry Ford Hospital, is a former professor of dermatology at the University of Texas, Galveston, and at Jefferson Medical School, Philadelphia.

American Heart President Coming

The president of the American Heart Association will speak at the 1967 Michigan Heart Association Scientific Session. He is L. E. January, M.D., of the University of Iowa.

The day-and-a-half session will begin at 2:00 p.m., February 24, in the Sheridan Cadillac Hotel, Detroit. For more information physicians may contact Michigan Heart Association, 13100 Puritan, Detroit 27, phone 342-2100.

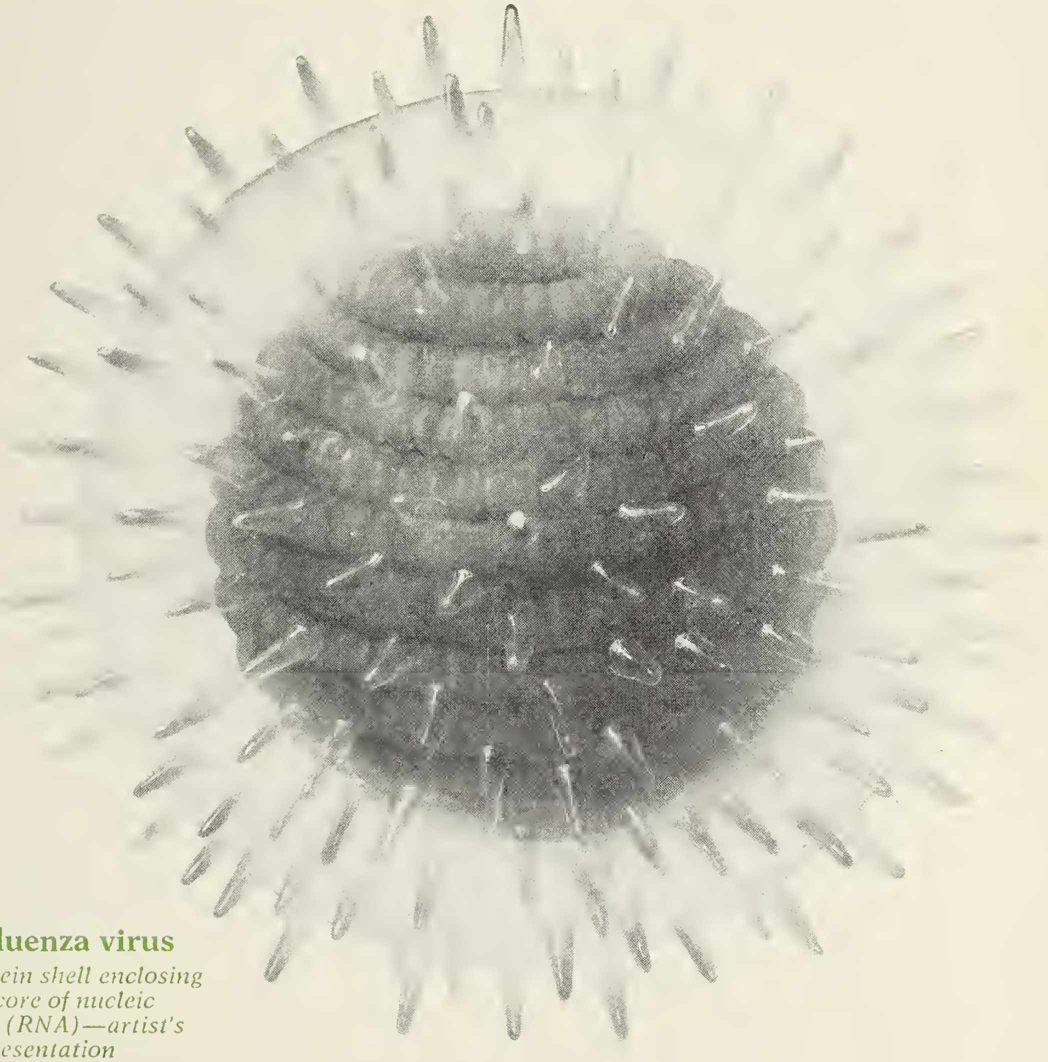
Require New Overseas Smallpox Certificate

As of January 1, smallpox vaccinations for international travel must be recorded on a new certificate which will state whether a freeze-dried or liquid vaccine was used, and the origin and batch number of the vaccine. The Michigan Department of Public Health also adds:

Smallpox vaccination certificates issued before January 1, 1967, however, will be valid for the length of time stated on them.

New from Du Pont
Symmetrel®
(Amantadine HCl)

he first oral chemical virostat for the prevention of influenza A_2



Influenza virus

Protein shell enclosing the core of nucleic acid (RNA)—artist's representation

The incidence of influenza A_2. In this country, where influenza is one of the leading causes of morbidity, influenza A_2 (Asian) continues to be a serious medical problem. In 1957 influenza A_2 was responsible for approximately 40,000 excess deaths in a three-month period. Since that year the most prevalent influenza virus has been A_2 (Asian).

What is Symmetrel®? "Symmetrel" (amantadine HCl) is a new synthetic chemical which acts as a molecular barrier to virus penetration. It provides for the first time specific oral medication for the prevention of respiratory infections caused by influenza A_2 (Asian) viruses—an entirely new approach in preventive medicine.

For prescribing information, see last page of this presentation

What Symmetrel® (amantadine HCl) means to you

...the first and only oral chemical agent to prevent influenza A_2 (Asian).

...not a vaccine or antibiotic, but a new synthetic chemical unrelated to any other chemotherapeutic agent.

...unique mode of action: prevents virus penetration of the host cell without affecting vital cell functions.

...specifically active against all influenza A_2 viruses tested to date.

...not indicated for the prevention of influenzal or respiratory illness other than influenza A_2 or for the treatment of established disease.

...does not interfere with normal antibody response; acts in concert with pre-existing antibody.

What Symmetrel® means to your patient

...possible immediate influenza A_2 protection when taken following suspected contact.

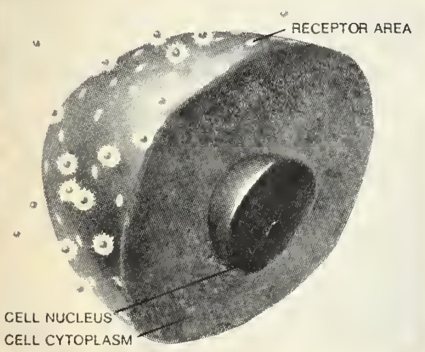
...may be particularly useful during outbreaks or epidemics and for high-risk patients in whom the occurrence of influenza A_2 is especially hazardous.

...a high degree of safety in clinical use.

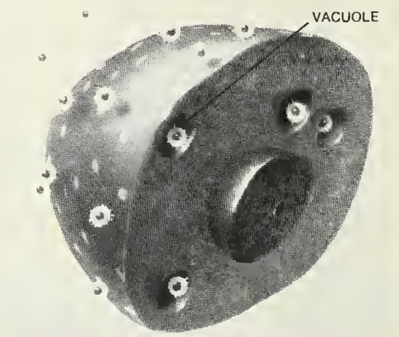
...simple once daily or b.i.d. dosage.

The mode of action of Symmetrel®

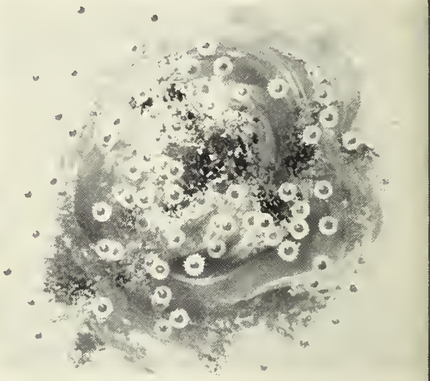
How the influenza virus invades and destroys the untreated cell



1 Viruses outside the cell attach themselves to specific cell receptor areas

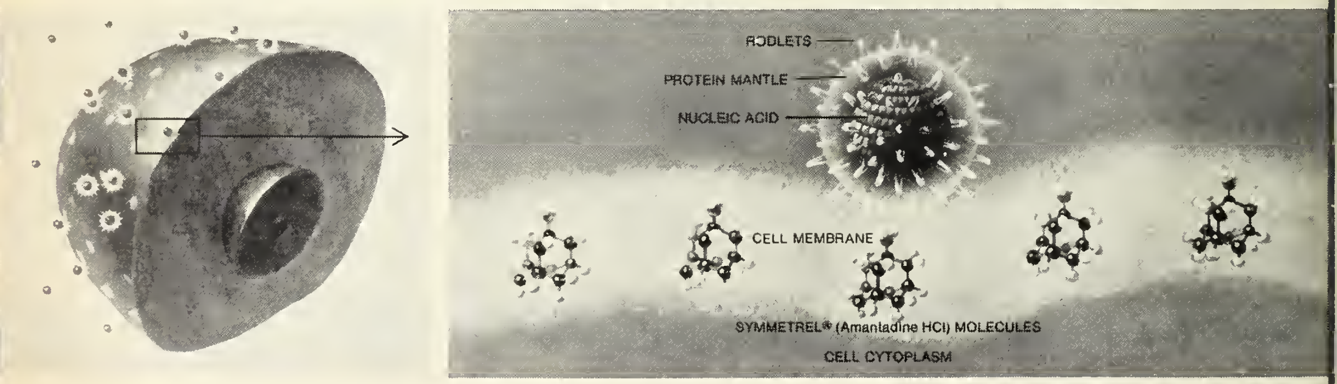


2 The virus is incorporated into a vacuole within the cell. From this vacuole the virus nucleic acid passes into the cell cytoplasm



3 The virus nucleic acid then directs the cell to produce both new virus nucleic acid and virus protein coat material which aggregate to form new virus particles. This process leads to the release of new virus particles and eventual destruction of the cell

How Symmetrel® (Amantadine HCl) prevents virus invasion[1]



Our current knowledge leads us to believe "Symmetrel" acts as a molecular barrier to influenza virus penetration. Shown here in a greatly enlarged section, "Symmetrel"— located at the cellular membrane—effectively prevents (blocks) virus penetration. Thus, "Symmetrel" does not directly destroy the virus particle but acting as a virostat prevents the cycle of virus penetration, virus replication, and cell destruction that is characteristic of virus invasion of animal cells (tissue). *Artist's conception based on current scientific knowledge.*

[1] "Mode of Action of the Antiviral Activity of Amantadine in Tissue Culture", Hoffmann, C. E.; Neumayer, E. M.; Haff, R. F.; and Goldsby, R. A., Journal of Bacteriology *90*,623 (1965).

Safety of Symmetrel® Confirmed. When used as indicated, is generally well tolerated. No kidney, liver, bone marrow, or hematological disturbances have been observed.

Prescribing Information

Indications: "Symmetrel" is indicated for the prevention (prophylaxis) of influenza A_2 in persons of all age groups. Early use is recommended, preferably before or as soon as possible after actual or suspected contact with individuals suffering from influenza A_2. "Symmetrel" should especially be considered for high influenza-risk patient groups such as those suffering from chronic debilitating diseases and elderly persons.

Contraindications: Not indicated for the prevention of influenzal or respiratory illness other than influenza A_2 or for the treatment of established disease.

Warnings: Administration to patients with central nervous system disease, particularly geriatric patients with cerebral arteriosclerosis, and patients with a history of epilepsy or other "seizures," requires strict observation for possible untoward effects (see Adverse Reactions). Patients taking psychopharmacologic drugs, central nervous system stimulants, or alcoholic beverages should be observed for possible evidence of intolerance. Those patients who experience central nervous system effects or blurring of vision should be cautioned against driving or working in situations where alertness is important.

No teratogenic effects have been seen in reproductive studies in rats and rabbits. Studies in pregnant women have, however, not been done and use of this drug in women of childbearing age should be undertaken only after weighing the possible risks to the fetus against benefit to the pregnant patient. It should not be administered to nursing mothers since it is not known whether the drug is secreted in the milk.

Precautions: Ineffective against bacterial infections. Patients should be observed for idiosyncratic reactions as with all new drugs. Geriatric patients with pre-existing serious medical illnesses with mental or physical deterioration should be followed carefully medically while taking "Symmetrel." (See Adverse Reactions.)

Adverse Reactions: With higher than indicated doses manifestations of central nervous system effects such as nervousness, insomnia, dizziness, lightheadedness, drunken feeling, slurred speech, ataxia, inability to concentrate and some psychic reactions including depression and feelings of detachment were seen. Occasional blurred vision was reported at higher doses. Some of the milder and less pronounced symptoms above have been reported in a small number of patients taking the recommended dosage of 200 mg per day. Those were mostly transient and disappeared with continued administration of the drug. Some geriatric patients developed paranoid or hallucinatory behavior and became unmanageable while taking 200 mg daily. Medically unselected seriously deteriorated geriatric patients showed poor clinical tolerance after several weeks of daily dosing with 200 mg per day. One elderly patient with a history of prior cerebrovascular accident developed visual hallucinations and grand-mal convulsions while on drug at 800 mg per day. Some cases of dry mouth, gastrointestinal upset and skin rash and rarely, tremors, anorexia, pollakiuria, and nocturia have been also reported.

Safety: When used as indicated, is generally well tolerated. No kidney, liver, bone marrow, or hematological disturbances have been observed.

Dosage: *Adults:* Two 100 mg capsules (or 4 teaspoonfuls of syrup) as a single daily dose or the daily dose may be divided into one capsule of 100 mg (or 2 teaspoonfuls of syrup) twice a day.

Children: 1 yr.—9 yrs. of age: Calculate total daily dose on the basis of 2 mg to 4 mg per pound of body weight per day (but not to exceed 150 mg per day). Daily dose, given as the syrup, should be given in 2 or 3 equal portions.

9 yrs.—12 yrs. of age: Total daily dose 200 mg given as one capsule of 100 mg (or 2 teaspoonfuls of syrup) twice a day.

How Supplied: *Capsules:* Bottles of 100. Each red, gelatin capsule contains 100 mg amantadine HCl.
Syrup: Bottles of 1 pint. Each 5 ml (1 teaspoonful) contains 50 mg amantadine HCl.

DU PONT
REG U S PAT OFF

Symmetrel®
(Amantadine HCl)
A molecular barrier to virus penetration

arrest diarrhea

in • gastroenteritis • acute infections

RI 132
POLICE

LOMOTIL®

Each tablet and each 5 cc. of liquid contains:

diphenoxylate hydrochloride .... 2.5 mg.
(Warning: May be habit forming)
atropine sulfate .... 0.025 mg.

Effectiveness: Lomotil possesses a unique degree of effectiveness in both acute and chronic diarrhea.

Convenience: Lomotil is supplied as small, easily carried, easily swallowed tablets and as a pleasant, fruit-flavored liquid.

Versatility: The therapeutic efficiency, safety and convenience of Lomotil may be used to advantage alone or as adjunctive therapy in diarrhea associated with:

- **Ulcerative colitis**
- **Acute infections**
- **Irritable bowel**
- **Regional enteritis**
- **Drug therapy**
- **Food Poisoning**
- **Functional hypermotility**
- **Malabsorption syndrome**
- **Ileostomy**
- **Gastroenteritis and colitis**

Dosage: For correct therapeutic effect—Rx correct therapeutic dosage. The recommended initial daily dosages, given in divided doses, until diarrhea is controlled, are:

Children: **Age**	**Total Daily Lomotil Dosage**		**Lomotil Liquid Dosage** (Each teaspoonful [4 cc.] contains 2 mg. of diphenoxylate HCl)
3-6 months .	3 mg.	🥄🥄🥄	½ tsp. 3 times daily
6-12 months .	4 mg.	🥄🥄🥄🥄	½ tsp. 4 times daily
1-2 years . . .	5 mg.	🥄🥄🥄🥄🥄	½ tsp. 5 times daily
2-5 years . . .	6 mg.	🥄🥄🥄	1 tsp. 3 times daily
5-8 years . . .	8 mg.	🥄🥄🥄🥄	1 tsp. 4 times daily
8-12 years .	10 mg.	🥄🥄🥄🥄🥄	1 tsp. 5 times daily

Adults: 20 mg. (2 tsp. 5 times daily or 2 tablets 4 times daily) Based on 4 cc. per teaspoonful. Maintenance dosage may be as low as one-fourth the initial daily dose.

Precautions: Lomotil, brand of diphenoxylate hydrochloride with atropine sulfate, is a Federally exempt narcotic preparation of very low addictive potential. Recommended dosages should not be exceeded. Lomotil should be kept out of reach of children since accidental overdosage may cause severe respiratory depression. Lomotil should be used with caution in patients with impaired liver function and in patients taking addicting drugs or barbiturates. The subtherapeutic amount of atropine is added to discourage deliberate overdosage.

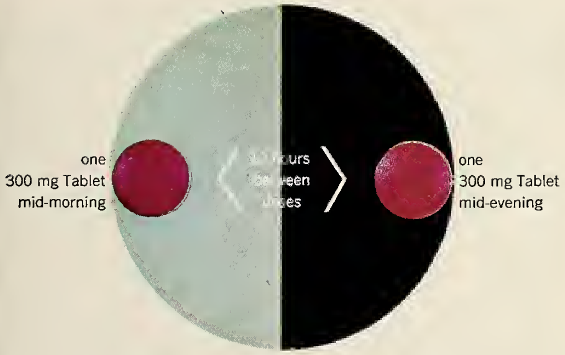
Side Effects: Side effects are relatively uncommon but among those reported are gastrointestinal irritation, sedation, dizziness, cutaneous manifestations, restlessness, insomnia, numbness of extremities, headache, blurring of vision, swelling of the gums, euphoria, depression and general malaise.

SEARLE *Research in the Service of Medicine*

why wonder about a drug

when you know

DECLOMYCIN®
DEMETHYLCHLORTETRACYCLINE
is effective b.i.d.



It's made for b.i.d.

ffective in a wide range of everyday infections—respiraory, urinary tract and others—in the young and aged—ne acutely or chronically ill—when the offending organsms are tetracycline-sensitive.

ontraindication—History of hypersensitivity to demethylhlortetracycline.

arning—In renal impairment, usual doses may lead to xcessive systemic accumulation and liver toxicity. Under uch conditions, lower than usual doses are indicated nd, if therapy is prolonged, serum level determinations nay be advisable. A photodynamic reaction to natural or rtificial sunlight has been observed. Small amounts of rug and short exposure may produce an exaggerated unburn reaction which may range from erythema to evere skin manifestations. In a smaller proportion, phoallergic reactions have been reported. Patients should void direct exposure to sunlight and discontinue drug at ne first evidence of skin discomfort.

recautions and Side Effects—Overgrowth of nonsuscepble organisms may occur. Constant observation is essential. If new infections appear, appropriate measures should be taken. Use of demethylchlortetracycline during tooth development (last trimester of pregnancy, neonatal period and early childhood) may cause discoloration of the teeth (yellow-grey-brownish). This effect occurs mostly during long-term use but has also been observed in short treatment courses. In infants, increased intracranial pressure with bulging fontanels has been observed. All signs and symptoms have disappeared rapidly upon cessation of treatment. Side reactions include glossitis, stomatitis, proctitis, nausea, diarrhea, vaginitis and dermatitis. If adverse reaction or idiosyncrasy occurs, discontinue medication and institute appropriate therapy. Anaphylactoid reactions have been reported.

Average Adult Daily Dosage: 150 mg q.i.d. or 300 mg b.i.d. Should be given 1 hour before or 2 hours after meals, since absorption is impaired by the concomitant administration of high calcium content drugs, foods and some dairy products.

Capsules: 150 mg; *Tablets:* film coated, 300 mg, 150 mg, and 75 mg of demethylchlortetracycline HCl.

EDERLE LABORATORIES, A Division of American Cyanamid Company, Pearl River, New York **Lederle**

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for noses of every description, one safe and sure prescription:

Otrivin®

(xylometazoline CIBA)
on Rx only

■ quickly relieves congested nose
■ action is gentle, yet prolonged
■ side effects are minimal

INDICATION: Nasal congestion. CONTRAINDICATION: Do not use in patients sensitive to small doses of sympathomimetic substances. WARNINGS: Prolonged or excessive use may cause rebound congestion. Use cautiously in patients with hyperthyroidism, coronary artery disease, hypertension, and diabetes. CAUTION: Do not shake Nasal Spray. Rinse Nasal Solution dropper or Nasal Spray tip in hot water after each use. No more than one person should use the same dropper bottle or nasal spray.

SIDE EFFECTS: Occasional local reactions: rebound congestion, slight burning or stinging, sneezing, dry nose. Occasional systemic effects: headache, drowsiness, lightheadedness, insomnia, palpitations. Overdosage in young children may produce profound sedation. DOSAGE: **Adults:** *Nasal Solution*—2 or 3 drops in each nostril every 4 to 6 hours. *Nasal Spray*—Squeeze rapidly once or twice in each nostril every 4 to 6 hours. **Children under 12:** *Pediatric Nasal Solution*—2 or 3 drops in each nostril every 4 to 6 hours. One drop should be used in infants under 6 months. *Pediatric Nasal Spray*—Squeeze rapidly once in each nostril holding tube upright; repeat every 4 hours as necessary. SUPPLIED: OTRIVIN® hydrochloride (xylometazoline hydrochloride CIBA) *Nasal Solution*, 0.1%; dropper bottles of 1 fluidounce bottles of 1 pint. *Nasal Spray*, 0.1%; plastic squeeze tubes of 15 ml *Pediatric Nasal Solution*, 0.05%; dropper bottles of 1 fluidounce. *Pediatric Nasal Spray*, 0.05%; plastic squeeze tubes of 15 ml. *Nasal Solutions* contain either 0.1% or 0.05% xylometazoline hydrochloride triethanolamine, hydrochloric acid, sodium chloride, and phenylmercuric acetate 1:50,000 as preservative in water. *Nasal Sprays* contai either 0.1% or 0.05% xylometazoline hydrochloride, potassium phosphate monobasic, potassium chloride, sodium phosphate dibasic sodium chloride, and benzalkonium chloride 1:5000 as preservative i water. *Consult complete literature before prescribing.*

CIBA Pharmaceutical Company, Summit, N. J.

C I B A

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The New Look

BY BROOKER L. MASTERS, M.D., CHAIRMAN, MSMS PUBLICATION COMMITTEE

The Publication Committee hopes that you noticed something different about this January issue of Michigan Medicine.

In a continuing effort to improve the content and readability of Michigan Medicine, the Committee offers a number of changes. And you'll find more in future issues.

The cover design and many other typographical aspects of this new journal are different and refreshing. An effort has been made to streamline and simplify the journal format. The design is clean and the readability is improved.

Hand-in-hand with the mechanical improvements, the Publication Committee and The Council pledges further improvements in the content.

One of the articles of special interest in this issue is the comprehensive piece about "The Future of Health Insurance, Prepayment, and Insurance," the first in a series of papers solicited by the MSMS Medical Socio-Economics Committee.

Another change in Michigan Medicine begins this month — the frequency is being increased to twice a month. In an effort to increase communications with the members and in an effort also to consolidate some of the other MSMS mailings, the Publication Committee will issue a small, four-page Michigan medicine "News Extra" about the 15th of each month. It will appear on blue paper — much like the center insert in this issue. Watch for it. (Medigram will be issued as a legislative action newsletter in 1967 to complete the lineup of MSMS publications to its members).

The Publication Committee welcomes your comments as we sincerely seek to better serve every MSMS member with this fine publication.

Continue VD Efforts

BY BENJAMIN SCHWIMMER, M.D., CHAIRMAN MSMS VENEREAL DISEASE COMMITTEE

The two-month "VD Education" effort by the Michigan State Medical Society during October and November led to two conclusions:

1. Ignorance and misunderstanding about venereal disease are still very common, even among the educated.

2. Education among the physicians and public must be continued if the present increase in incidence is to be checked and reversed.

The situation is serious and merits the attention of the medical profession. The incidence of gonorrhea and syphilis in the United States has reached such proportions that it is equal to or greater than that of all other reportable communicable diseases among adults. The VD Branch of the federal Communicable Disease Center estimates that 85,000 persons every day contract infections of gonorrhea and 10,000 of syphilis — and these include an estimated 1,500 teenagers daily.

Michigan physicians during the two-month MSMS campaign carried out very fine programs in Muskegon, Grand Rapids and other communities. Efforts by the MSMS Venereal Disease Control Committee and Public Health Committee were successful in reaching the Michigan Association of Child Study Clubs, the Youth Advisory Council of the Michigan Youth Commission, the Michigan Congress of Parents and Teachers and other groups.

The physicians recognize the leadership role they can play in the everyday efforts for improved VD Education, and invite the cooperation of nurses, teachers, social workers, ministers, youth workers, reporters, and others.

Alcoholism Is Treatable

BY C. K. STROUP, M.D., CHAIRMAN COMMITTEE ON ALCOHOLISM

Judging by the number of articles appearing in the popular press, alcoholism seems to be gaining recognition as a disease worthy of public attention and action.

News items appear almost daily. Popular columnists have caught the drift and give advice to their readers. We read about recent Federal action in the Office of Health, Education and Welfare; and about the Supreme Court case. The attentive reader can see the forces of public opinion, private and governmental action slowly aligning themselves against this disease.

These have the appearance of significant strides since April of 1956 when the American Medical Association first accepted the disease concept of alcoholism. But I, and others close to the scene, have mixed feelings. We are pleased at the progress made in winning public acceptance of alcoholism as a disease, but dismayed at our lack of progress as a profession in coping with it.

The responsibility for accepting and treating alcoholic patients is ours.

Certainly we can recognize the roadblocks. We have no "miracle drugs", as penicillin was in the treatment of syphillis, or insulin in the treatment of diabetes. But we can, as physicians, borrow a philosophy we have in our treatment of diabetics. We have come to expect lapses in our diabetic patients and know how, for example, to handle the patient with acidosis or occasional sugar in his urine.

On the same basis we can expect lapses in our alcoholic patients and be prepared to handle them. Treatment of alcoholics should not be considered a failure if the major symptoms of the disease are now under control or receding. Much success has been achieved if the patient's marriage is no longer on the rocks, if his job is now secure, if his record of traffic violations is now cleared up and if he is no longer about to precipitate an acute liver failure.

Still the greatest obstacle, however, in our handling of the problem is the reluctance, or even resistance, of hospitals to admit patients with the diagnosis alcoholic. Allied to this is our lack of ancillary help in the form of alcoholism therapy.

Every general hospital needs an alcoholism unit staffed by qualified alcoholism therapists — just as every hospital needs dieticians, physical therapists and X-ray technicians. The status of alcoholism as the number-three killer among fatal diseases certainly deserves no less.

It is quite conceivable that hospitals will yield to the demand for beds for alcoholic patients if enough physicians ask for them. It is probable that hospital administrators will take a look at such demands when it can be demonstrated that they do not lose money by having alcoholic patients on the wards. A well-run therapy program can actually make expenses or better in the treatment of alcoholics. Our experience at Hurley Hospital in Flint demonstrates the fact beyond doubt.

Considering the fact that there are at least as many alcoholics as diabetics, and in view of the serious complications of the disease, it should be searched for by the private physician even as diabetes is. He should then treat the alcoholic with the same professional care that he exercises with any other patient. And he should ask for and expect to receive hospital facilities with ancillary care and treatment of the alcoholic that he does for any other. And when alcoholism is either the primary or complicating condition it should be listed in our hospital discharge summary.

With this philosophy in mind, the alcoholic should be admitted to hospitals, not to clear up a bout of drunkenness, but to treat alcoholism as a disease in the way it deserves.

Osler: Three Ideals

Sir William Osler often is quoted . . . here is one from May 2, 1905:

"I have had three personal ideals. One is to do the day's work well and not bother about tomorrow. It has been urged that this is not a satisfactory ideal. It is; and there is not one which the student can carry with him into practice with greater effect. To it, more than to anything else, I owe whatever success I have had — to this power of settling down to the day's work and trying to do it to the best of one's ability, and letting the future take care of itself.

"The second ideal has been to act the Golden Rule, as far as in me lay, towards my professional brethren and towards the patients committed to my care.

"And the third has been to cultivate such a measure of equanimity as would enable me to bear success with humility, the affection of my friends without pride, and to be ready when the day of sorrow and grief came — to meet it with the courage befitting a man.

"I have made mistakes, but they have been mistakes of the head; not of the heart. I can truly say, and I take upon myself to witness, that in my sojourn among you:

"I have loved no darkness
Sophisticated no truth,
Nursed no delusion,
Allowed no fear."

Maternal and Perinatal Welfare Conference Set at Flint, March 15-16

Beginning on Wednesday afternoon, March 15, and ending at noon on Thursday, March 16, the Committee on Maternal Health of the Michigan State Medical Society in cooperation with the Clara Elizabeth Fund of Flint, will present the Sixth Annual Michigan Conference on Maternal and Perinatal Welfare.

The meeting will be held at the Pick-Durant Hotel in Flint. The only cost for this fine postgraduate physician education program will be transportation, lodging, and meals.

The program includes the following topics:

WEDNESDAY

1:30 pm “Chronic Uterine Ischemia and Experimental Toxemia of Pregnancy,” by C. Paul Hodgkinson, M.D., Chairman of the Department of Gynecology-Obstetrics, Henry Ford Hospital, Detroit.

2:00 pm “The Effect of Nutrition on the Developing Nervous System,” by Philip R. Dodge, M.D., Professor and Head, Department of Pediatrics, Washington University School of Medicine, St. Louis, Missouri.

3:00 pm “Respiratory Distress in Newborn Infants from Causes other than Hyaline Membrane Distress,” by Robert H. High, M.D., Chairman, Dept. of Pediatrics, Henry Ford Hospital, Detroit.

3:30 pm “Viral Etiology of Congenital Heart Disease,” by Gordon C. Brown, Sc.D., professor in the School of Public Health at University of Michigan.

7:00 pm Banquet—followed by “The Role of the Physician in Family Life Education,” by S. Leon Israel, M.D., Professor of Obstetrics and Gynecology, School of Medicine, University of Pennsylvania, Philadelphia.

THURSDAY

9:00 am “Changing Indications for Therapeutic Abortion,” by J. Robert Willson, M.D., professor of Obstetrics and Gynecology, University of Michigan.

9:30 am “Unusual Causes of Maternal Mortality,” by Ronald H. Nishiyama, M.D., assistant professor of Pathology, University of Michigan.

10:30 am “Amniotic Fluid Embolism,” by David G. Anderson, M.D., assistant professor of Obstetrics-Gynecology at University of Michigan.

The above list includes only the topics being discussed and the speakers. The program itself provides time for coffee breaks, question and answer periods, and time for discussion.

The program is a once-a-year opportunity for physicians of Michigan to meet and discuss medical problems and the newest advances in this field with experts from all over the country.

William W. Jack, M.D., Chairman of the Committee on Maternal Health for the Michigan State Medical Society declares, “We are pleased to present these distinguished medical educators to speak on subjects regarding the care of the mother and her child — of interest to all physicians and of special benefit to general practitioners, gynecologists, obstetricians, pathologists, and pediatricians. We hope that you will mark the date — March 15-16 — on your calender now as a must in your postgraduate educational activities.”

Three More Counties Adopt Medical Examiner System

As 1967 begins, three more counties will utilize medical examiners instead of coroners. Grand Traverse, Charlevoix, and Emmet counties voted this fall to replace coroners with medical examiners.

Although 55 of the 83 Michigan counties still use elected coroners, the Michigan State Medical Society has for many years been on record as favoring the medical examiner system. The medical examiner system is better, the Michigan State Medical Society feels, because it makes the use of qualified physicians mandatory.

Many MSMS Members Speak, Exhibit at AMA

Thirteen Michigan physicians were listed in the convention program booklet as playing a special part at the AMA's 20th Clinical Convention held in Las Vegas, November 27-30.

Franklin V. Wade, M.D., Flint, was a member of the committee which presented the Special Exhibit on Fractures. The continuous demonstration dealt with basic principles of interest to the general practitioner.

Three members of the staff of Henry Ford Hospital were in charge of an exhibit on "Inflammatory Dynamics in the Rheumatoid Joint." They are Gilbert B. Bluhm, M.D., Jeanne M. Riddle, Ph.D., and Marion I. Barnhart, Ph.D.

Edward L. Moorhead, II, M.D., Joseph P. Elliott, M.D., John R. Caldwell, M.D., D. Emerick Szilagyi, M.D., Silvio Salerno, M.D., and A. R. Morales, M.D., also of Henry Ford Hospital, were in charge of the exhibit on "Pheochromocytoma."

"The Effect of Medicare: The Change in Patterns of Hospitalization" was an exhibit directed by Vergil N. Slee, M.D., and Eric Leighton, Commission on Professional and Hospital Activities, both of Ann Arbor.

Richard C. Schneider, M.D., Ann Arbor, presided at the forum on "The Football 'Nerve Pinch,'" a part of the Conference on the Medical Aspects of Sports. Speaking at the same conference was James S. Feurig, M.D., East Lansing, whose topic was "Management of the Athlete with a 'Nerve Pinch.'"

Boy Frame, M.D., Detroit, was a member of the breakfast Round Table Discussion on the topic of "The Management of Metabolic Bone Diseases," and Joseph L. Ponka, M.D., Detroit, presented a motion picture on Hernia.

Appoint Rice to Board Of Sears Foundation

Robert E. Rice, M.D., Greenville, has been appointed to a four-year term on the Medical Advisory Board of the Sears-Roebuck Foundation, it was recently announced.

Doctor Rice is currently serving as a MSMS delegate to the AMA, and is chairman of the MSMS Committee on Rural Medical Service.

NEWSPAPER STRESSES VALUE OF MSMS MEDI-LABEL OFFER

The following item appeared recently in a newspaper column, "Off the Cuff" by Vince Courtenay, managing editor, in the *Dearborn Press*:

"The Michigan State Medical Society has a new attachment for the new Michigan drivers' licenses.

"They are issuing a sticker that describes the driver's medical history in capsule form. This little sticker will disclose at a glance, hopefully, such things as blood type, allergy sensitivity, immunizations and information of special concern to physicians.

"They are free and available from your family physician. Why not grab one?"

mediscene

JAN. 16-MAR. 17; OCT. 9-13 — Hospital Food Service Supervisors, Kellogg Center, Michigan State University

JAN. 17 — Edsel B. Ford Memorial Lecture, Henry Ford Hospital, Detroit

JAN. 18-20 — Michigan Institute on Smoking and Health, Kellogg Center, Michigan State University

JAN. 25 — MSMS Council, MSMS Headquarters

FEB. 14 — Galens Honorary Medical Society Lectureship, by AMA President Charles L. Hudson, University of Michigan

FEB. 24-25 — Heart Days Public Heart Forum, Michigan Heart Association, Sheraton-Cadillac Hotel, Detroit

MAR. 8 — MSMS Council, MSMS Headquarters

MAR. 15-16 — Annual Michigan Conference on Maternal and Perinatal Welfare, Pick-Durant Hotel, Flint

APR. 3 — Beaumont Lecture, Wayne County Medical Society Building, Detroit

APR. 6 — Annual Membership Conference, Michigan League for Nursing, Kellogg Center, Michigan State University

APR. 19 — MSMS Council, MSMS Headquarters, East Lansing

MAY 7-12 — American Psychiatric Association, Cobo Hall, Detroit

MAY 17-19 — Michigan Public Health Association Conference, Pantlind Hotel, Grand Rapids

MAY 31 — MSMS Council, MSMS Headquarters

JUNE 18-22 — 1967 AMA Annual Convention, Jersey City, New Jersey

Physicians Urged to Continue Interest In Legislation; November Efforts Lauded

BY ROBERT J. MASON, M.D.
CHAIRMAN, THE MSMS COUNCIL

On January 11, 1967 a "new look" Michigan Legislature will assemble in the State Capitol. It will be composed of nearly equal numbers of Republicans and Democrats. This political "stand-off" creates a situation in which neither political party can hope to accomplish its aims without a degree of support from the other.

Insofar as health legislation is concerned, therefore, MSMS must continue to work with *all* Senators and Representatives, of both parties, in its efforts to protect the best health interests of the people of Michigan. And when the next election draws near, physicians must again work to encourage the reelection of legislators of either party who have shared their views.

MICHIGAN'S DOCTORS OF medicine, in unprecedented numbers, took a personal and active interest in the election of 1966. They gave of their time and their substance and they worked hard, for candidates of both political parties who had compiled commendable records with respect to health legislation.

The 1967 State Legislature will be vastly different than the 1966 version. One third of its members will be serving their first terms, and practically all members will have altered committee assignments. As a result, *your* Legislators may be serving on committees important to medicine in 1967.

IN EVERY COUNTY of Michigan, doctors of medicine should now arrange for frequent meetings with their State Legislators to create rapport, to explain medicine's positions as these unfold with the introduction of proposals for amended or new health legislation, and to seek mutual understanding.

Our State Legislators will soon begin to compile their individual "records." We will only be able to evaluate those records if we have shared our own views with the Legislator and asked him to explain his own to us. Both we and they will benefit from such exchanges, and hopefully the end product will be better government for the benefit of our patients.

Have You Joined?

Have you joined MDPAC-AMPAC?

Be a dues-paying 1967 member. That's the invitation issued by the MDPAC Board Members.

For full information ask your county society president or write to MDPAC, Box 169, East Lansing.

Questions Raised About Practical Politics

"Responsible citizenship demands no less than responsible action — your action."

That contention is made in a new Political Responsibility Folder (No. 9) published by the Michigan State Chamber of Commerce.

The publication raises a number of questions aimed at the voting citizen. The questions include:

> Do you know your state legislators personally?
>
> If not, why not?
>
> Who do you think should take the initiative in getting acquainted?
>
> Have you talked with your legislators personally — recently?
>
> What are their views on issues of concern to you — your business?
>
> Do they know your views, your ideas, your potential stake in their political future?
>
> Do you know their record?
>
> Have they worked in the balanced interest of your business, your stockholders, your employees, your customers?
>
> Should they continue in office, or be replaced by a more worthy, better qualified citizen?

"These are not academic questions," the folder continued. "They are practical political questions that you — only you — can answer."

Extract of Council Minutes, November 9

THE COUNCIL RECEIVED a report from Michigan Medical Service President John M. Wellman, MD, and subsequently requested the Committee on Governmental Medical Care Plans to meet with the Blue Shield Medical Advisory Committee to discuss certain matters in connection with Title XIX payment mechanisms.

DISCUSSED MATTERS OF mutual interest with the director of the Michigan Department of Public Health and with the director of the Michigan Department of Mental Health.

APPOINTED AS General Chairman of the 1967 Annual Session was Harold H. Hiscock, MD, Flint.

AGREED TO A second meeting between representatives of MSMS and Michigan representatives of the National Medical Association.

GAVE FINAL AUTHORIZATION to sign the 1967 contract with the Office for Dependents Medical Care after MSMS requests for amendments had been met.

EXPRESSED ITS WILLINGNESS to cooperate with the Detroit Institute of Arts in producing a 1968 "Doctor Collects Art" exhibition.

HEARD A REPORT on implementation of the House of Delegates instructions regarding the Hospital Utilization Review Manual and it was concluded that The Council had completed its work by notifying all those authorized by The Council to receive the manual that approval had been withdrawn.

AUTHORIZED LEGAL COUNSEL to file a brief as amicus curiae in litigation regarding staff privileges and challenges to hospital staff bylaws.

STUDIED PROGRESS on Administration of Title XIX and staff was directed to prepare a detailed analysis of quality control proposals.

AUTHORIZED PUBLICATION of a mid-month extra number of *Michigan Medicine* to provide up-to-the-minute news. This issue would be in the form of a newsletter.

APPROVED AN increase in classified advertising rates for *Michigan Medicine*.

AUTHORIZED THE COMMITTEE on Alcoholism and Drug Addiction to participate in an alcoholism educational program during December and January.

MET WITH MEMBERS of the Michigan Delegation to the AMA to discuss plans for the AMA Clinical Meeting in November.

REQUESTED MICHIGAN HOSPITAL Service and Michigan Medical Service to make a study comparing current statistics on length of stay with suggested criteria established by the Utilization Review Manual.

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Series Continued about Federal Medical Programs; Please Save

EDITOR'S NOTE: In the October issue, important information on Title XIX (Medicaid) was published. This insert had a distinctive color from the other pages and could easily be removed from *Michigan Medicine* for ready reference and future use.

Effective with this issue and for the next few issues, special inserts containing information on a number of governmental agencies rendering service in the medical and health field will be printed. Physicians need such information in reference form so that they can effectively counsel their patients.

They also will be well advised to have their medical assistants become familiar with these various programs.

Printed below is general information on the Dependents' Medical Care program, the United States Public Health Service Hospital, the Veteran's Hometown Medical Care program and the Veteran's Hospitalization and Outpatient Care program. As noted in each of these government programs, further information can be obtained from these agencies.

United States Public Health Service Hospital

SERVICES AVAILABLE: United States Public Health Service Hospitals provide general medical, surgical and dental services, either on an inpatient or outpatient basis, to individuals entitled to receive such services by Federal statute. The United States Public Health Service Hospital in Detroit is located on Windmill Pointe at 14700 Riverside Drive. This hospital supervises the medical care activities under contractual agreement of nine U.S. Public Health Service Outpatient Offices and six Designated Physicians' Offices scattered through the State of Michigan.

BENEFICIARY CATEGORIES: Individuals entitled by law to receive medical care at U.S. Public Health Service medical facilities are classified into more than 30 different groups called beneficiary categories. The extent of care which can be rendered at government expense varies with the different beneficiary categories, the more frequently encountered of these being:

1. American Seamen. The term "seaman" includes any person employed on board in the care, preservation or navigation of a vessel, registered, enrolled and licensed under the U.S. Maritime Law. In general, an American Seaman is eligible for medical examination and treatment at U.S. Public Health Service Hospitals, Outpatient Clinics or Outpatient Offices after he has had at least 60 days of continuous duty as a seaman, a part of which must be within 90 days of the date of application for medical care.

2. Active Duty Coast Guardsmen are eligible for medical examination and treatment at U.S. Public Health Service Hospitals, Outpatient Clinics or Offices and Designated Physicians' Offices upon presentation of a valid Identification Card. The U.S. Public Health Service Commissioned Corps is the "medical arm" of the U.S. Coast Guard.

3. Bureau of Employees' Compensation patients are referred to U.S. Public Health Service Hospitals, and Outpatient Clinics through the use of B.E.C. Forms CA-16, 17 or 33. These patients represent Federal Civil Service employees who have been injured or taken ill in line of duty, such injury or illness being causally related to the nature or condition of employment.

4. Dependents Medical Care Act beneficiaries. These include active duty or retired members of the U.S. Army, Navy, Marine Corps, Air Force, Public Health Service Commissioned Corps, retired members of the U.S. Coast Guard as well as legal dependents of active duty, retired or deceased members of the Uniformed Services (U.S. Army, Navy, Air Force, Marine Corps, Coast Guard, Coast and Geodetic Survey and Public Health Commissioned Corps). Proof of eligibility is by presentation of a valid Uniformed Services Identification and Privilege Card.

5. Federal Government Employees. Fitness for duty examinations are performed on applicants for Civil Service positions in Federal agencies as requested by the Civil Service Commission. Fitness for Duty examinations on Federal Govern-

ment employees for purposes of promotion, retention in Service or retirement are performed upon proper referral from a Federal agency. Except for medical examinations, medical services provided to Federal Government agencies, which is covered under the Economy Act, are furnished on a reimbursable basis.

6. Immunization Service. Any person requiring immunizations for Yellow Fever may obtain this service gratis at the Detroit U.S. Public Health Service Hospital on Wednesdays at 10 o'clock in the morning.

7. Narcotic Addicts. Males addicted to narcotic drugs (excluding barbiturates, amphetamine, alcohol) may seek voluntary admission directly to the U.S. Public Health Service Hospital in Lexington, Kentucky or Fort Worth, Texas. Female narcotic addicts may seek voluntary admission directly to the U.S. Public Health Service Hospital in Lexington, Kentucky.

8. Leprosy Patients. Any person afflicted with leprosy may seek admission into the U.S. Public Health Service Hospital, Carville, Louisiana.

ADDITIONAL INFORMATION may be obtained by writing the Chief, Division of Hospitals, Public Health Service, Department of Health, Education and Welfare, 7915 Eastern Avenue, Silver Springs, Maryland 20910.

Veterans Hometown Medical Care Program

SERVICES AVAILABLE:

1. Treatment by a private physician at Veterans Administration expense is available to veterans, when treatment is not feasible in a Veterans Administration Clinic or Hospital. Entitlement is limited to treatment of service-connected conditions.

2. Home nursing care may be furnished to veterans previously determined eligible for outpatient treatment, under certain restricted conditions.

3. In certain restricted circumstances, hospitalization in a *non-Veterans Administration Hospital* may be provided for treatment of a *service-connected condition*, providing the urgency of the condition precludes admission to a Veterans Administration Hospital.

4. Prescriptions written in connection with authorized treatment of service-connected disabilities, should be brought or mailed to the Pharmacy Service, Veterans Administration Hospital, Dearborn, Michigan 48121. If presented in person, they will be compounded immediately; if mailed, medication will be forwarded within two days after receipt of the prescriptions. It is not feasible to mail prescriptions when the medication must be started immediately (within 10 days.) Prescriptions of this type may be filled by a local pharmacy.

It is the policy of the Hometown Care Program to provide the best medical care possible, (utilizing Veteran's Administration facilities to the greatest extent practicable) consistent with the needs and best interests of both the patient and the government.

ELIGIBILITY: It is stressed that medical services available in this program are limited to treatment of veterans *for a service-connected condition only*. The physician rendering treatment must be a registered participant in the Hometown Care Program.

APPLICATION:

1. Application for treatment by a private physician who is a participant in the Hometown Care Program, may be made by mail or by telephone (Extension 469) directly to the Authorizing Physician, Outpatient Clinic, Veterans Administration Hospital, Dearborn, Michigan.

It should be stressed that authorization for treatment under this program should be obtained in advance.

In the event non-hospitalization treatment is rendered for a *service-connected condition* in an *emergency* situation, however, the physician and/or outpatient facility, participating or non-participating in the Hometown Medical Care Program, must send notification to the Outpatient Clinic in Dearborn within fifteen (15) days of the date such services were rendered, to be considered for payment. (All claims are examined, but not all are payable, because some patients do not meet the eligibility requirements for services available in this program.)

2. Authorization for home nursing care of veterans previously determined eligible for outpatient treatment, must be obtained in advance from the Chief, Outpatient Clinic, Veterans Administration Hospital, Dearborn, Michigan.

3. Authorization for *hospitalization in a non-Veterans Administration Hospital,* for treatment of a service-connected condition, should be obtained in advance, if possible. Without advance authorization, (i.e., the patient requires immediate surgery) the Outpatient Clinic at the Veterans Administration Hospital in Dearborn must be notified within seventy-two (72) hours of admission if the hospital or physician desires to be con-

idered for payment. Because some patients do not meet the eligibility requirements for services available in this program, all claims are examined but all are not payable.

Authorization may be obtained by a telephone call to the Authorizing Physician (Extension 469), Outpatient Service, Veterans Administration Hospital, Dearborn, Michigan.

Any physician desiring to participate in the program should communicate with the Chief, Outpatient Service, at the Veterans Administration Hospital in Dearborn.

ADDITIONAL INFORMATION: Communicate directly with the Chief, Outpatient Service, Veterans Administration Hospital, Dearborn, Michigan.

Veterans Hospitalization And Outpatient Care

SERVICES AVAILABLE: Total hospital facilities and services are available for treatment of medical, surgical, and psychiatric conditions. General medical and surgical hospitals are located at Ann Arbor, Dearborn, Iron Mountain, and Saginaw, Michigan. A psychiatric hospital is located at Battle Creek, Michigan.

An outpatient clinic is located with the hospital at Dearborn, Michigan, and is equipped to provide normal outpatient care for medical, surgical and psychiatric conditions.

ELIGIBILITY: Entitlement for hospitalization is limited to veterans. Priority is given for treatment of conditions incurred or aggravated in military service. Treatment for conditions which are not service-connected are limited to veterans honorably discharged and who have served in the military forces during a period of war, providing further that such veterans are unable to pay for necessary care.

Entitlement for outpatient care is limited to treatment of veterans for service-connected conditions.

APPLICATION for admission should be made to the Veterans Administration Hospital nearest the home of the veteran, and may be made by mail, in person, or in the event of emergency, by telephone call from the physician attending the patient.

Application for outpatient care should be made direct to the Outpatient Clinic, Veterans Administration Hospital, Dearborn, Michigan, either by mail or in person.

ADDITIONAL INFORMATION: Any inquiries or requests for additional information about hospitalization may be directed to the nearest Veterans Administration Hospital.

For outpatient care, communicate directly with the Chief, Outpatient Service, Veterans Administration Hospital, Dearborn, Michigan.

PLAINWELL SANITARIUM, INC.

Plainwell, Michigan — MU 5-8441

Edwin M. Williamson, M.D.
M. Leroy Barry, M.D.

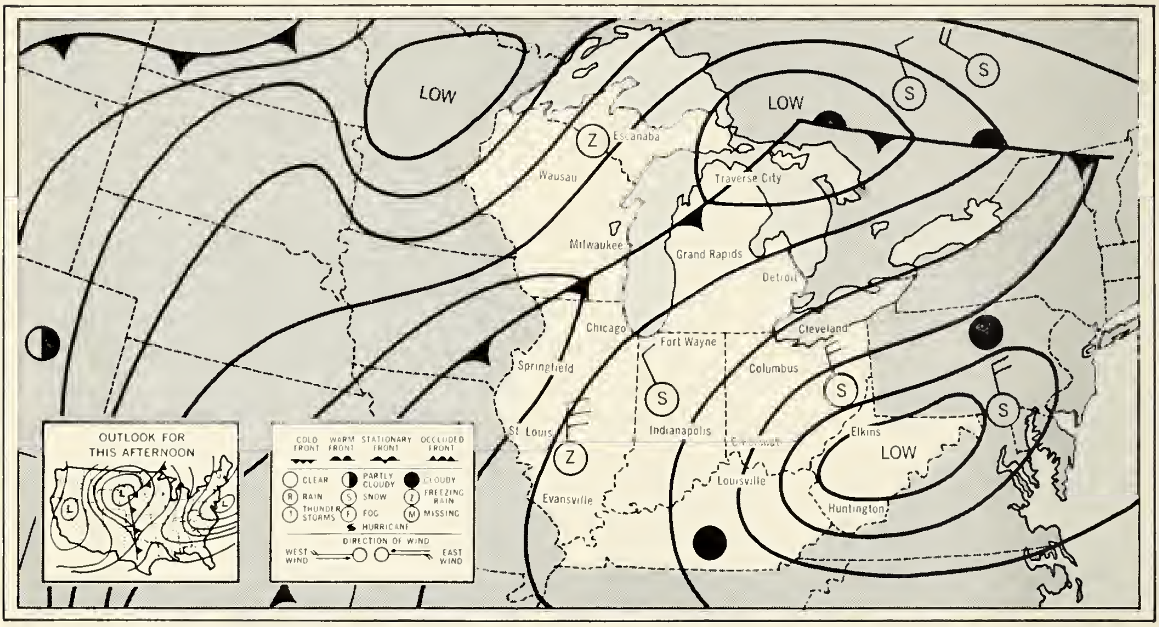
Dan W. Everett, M.D.
Wilbur R. King, Ph.D.

The Plainwell Sanitarium is a private psychiatric hospital licensed by the Michigan Department of Mental Health, and member of the American Hospital Association, Michigan Hospital Association, and National Association of Private Psychiatric Hospitals. Our extensive diagnostic treatment services include the following:

- Organic and psychological therapy for the psychiatrically and emotionally disturbed of all ages.
- Diagnostic evaluation of neurological disorders.
- Rehabilitative services for geriatric and convalescent patients.
- Medico-Legal counsel.
- Diagnostic and psychological evaluation and hospitalization, if indicated, of juveniles for Probate and Juvenile Courts.

REGIONAL WEATHER FORECAST

Severe Snow Storms, Strong Winds and Bitter Cold Followed by Cough, Stuffed and Runny Noses and Aches and Pains.


LOW
LOW
LOW
Escanaba
Wausau
Traverse City
Milwaukee
Grand Rapids
Detroit
Chicago
Fort Wayne
Cleveland
Springfield
Columbus
St. Louis
Indianapolis
Elkins
Evansville
Louisville
Huntington
OUTLOOK FOR THIS AFTERNOON
COLD FRONT
WARM FRONT
STATIONARY FRONT
OCCLUDED FRONT
CLEAR
PARTLY CLOUDY
CLOUDY
RAIN
SNOW
FREEZING RAIN
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FOG
MISSING
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WEST WIND
EAST WIND

Tussagesic breaks up coughs, quickly clears stuffed and runny noses and relieves aches and pains. Provide coverage of the tough cold for up to 24 hours with just a single timed-release tablet dosed morning, midafternoon and at bedtime.

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Triaminic® (phenylpropanolamine hydrochloride 25 mg., pheniramine maleate 12.5 mg., pyrilamine maleate 12.5 mg.)	50 mg.
Dextromethorphan hydrobromide	30 mg.
Terpin hydrate	180 mg.
Acetaminophen	325 mg.

Dosage: Adults—1 tablet, swallowed whole to preserve timed-release feature, in morning, midafternoon and at bedtime. *Side effects:* Occasional drowsiness, blurred vision, cardiac palpitations, flushing, dizziness, nervousness or gastrointestinal upsets. *Precautions:* The patient should be advised not to drive a car or operate dangerous machinery if drowsiness occurs. Use with caution in patients with hypertension, heart disease, diabetes or thyrotoxicosis.

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Urges More Alcoholism Programs In Michigan's General Hospitals

BY RALPH W. DANIEL
CHIEF OF THE ALCOHOLISM PROGRAM
MICHIGAN DEPARTMENT OF PUBLIC HEALTH

"Alcoholism is both a major chronic disease and a major social problem."[1] This combination of a health and a social problem is a unique quality of alcoholism. The combination of a social and a health problem raises questions. Who treats dual problems? And "How?"

Physicians cannot be expected to provide total treatment for alcoholics.

The social problems which are an integral part of alcoholism, cannot be considered the physicians' responsibility in treatment. There are other resources better qualified to handle social problems.

Alcoholism, the chronic disease, is not just the excessive use of alcohol and the physical result of this insult to the body. The *reasons* for the excessive drinking are as much a part of the disease as are the results.

THERE IS MUCH to be learned about the causes of excessive drinking in the alcoholic, but there is much reason to believe that the personality and emotions of the patient are just as likely to hold the causes of alcoholism as is the physical body of the patient.

Most physicians do not welcome alcoholic patients. One of the reasons may well be the fact that the patient expects *total* treatment from a medical practitioner. Physicians should not be expected to provide total treatment for those parts of the alcoholism problem which are non-medical.

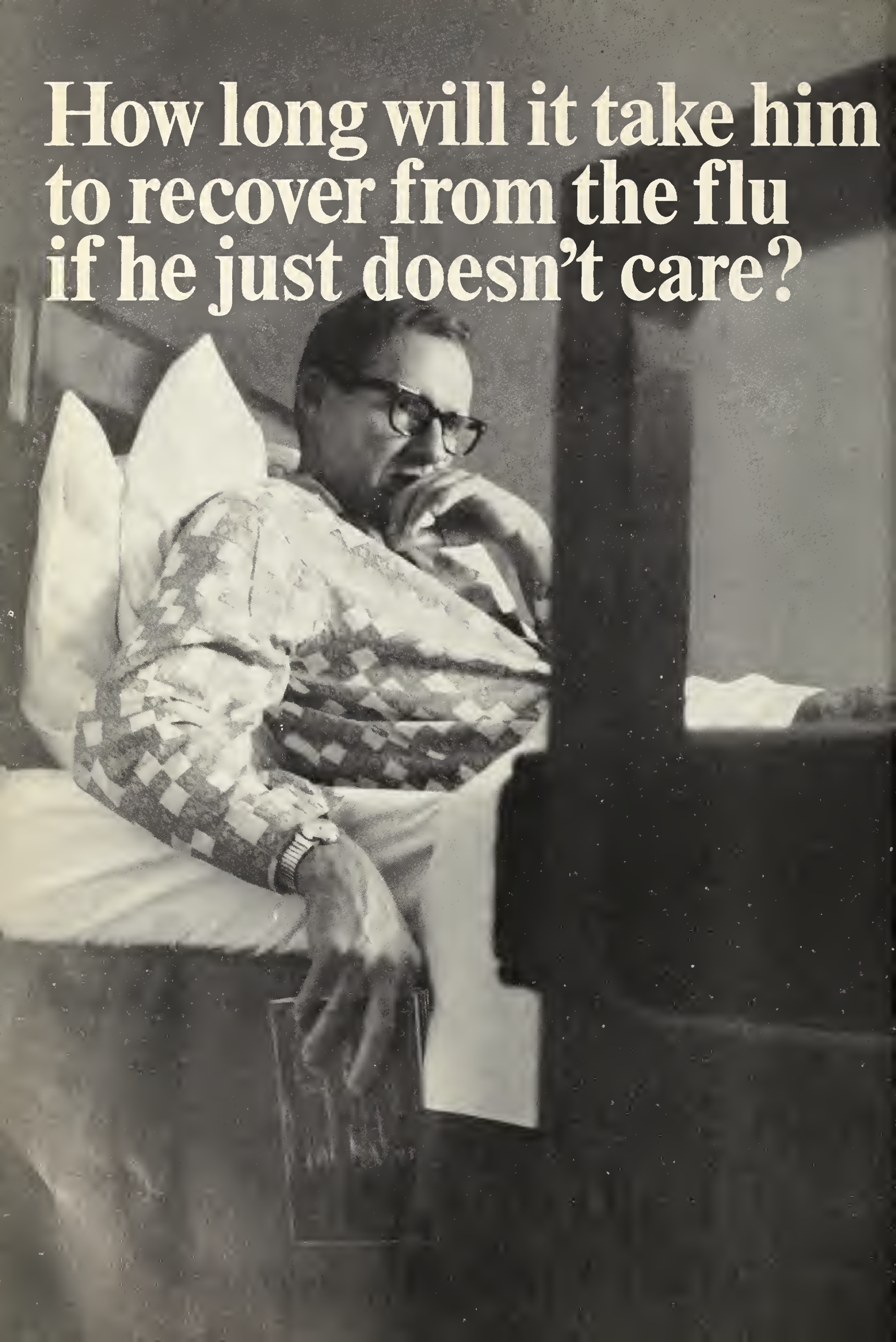
Michigan's Alcoholism Program[2] once established ten long-range goals including "Physicians who are ready, willing, and able to treat the acute phases of alcoholism and to use their skills to join with the community team that offers help for the chronic aspects of the illness." (It is interesting to note that this goal did not anticipate *total* treatment from the physicians.) Other goals in this list related to other professionals who should be a part of the community team.

PHYSICIANS ARE MORE likely to be working with a medical team rather than a community team. The receptionist, the nurse, the pharmacist, the hospital and even the family that nurses the patient and carry out the doctor's orders become a part of a medical team of sorts. There is a difference between this sort of a team and the community team. The doctor's "team" is made up of ancillary services which enable the patient to get other people to help him carry out the *doctor's* orders. Members of this team provide services which extend the services of the physician. Physicians work well with this sort of team.

THE COMMUNITY ALCOHOLISM team is not this kind of a team. It is not so well coordinated and it generally does not have a "boss." A good community alcoholism "team" will be made up of employers, law enforcement agencies, social agencies, welfare agencies, hospitals, clergymen, Alcoholics Anonymous, *and the physician.* For the most part, these are not paramedical services. Each of these resources has an independent service to perform. They may be well or poorly coordinated, but they are not carrying out the directions of one individual.

The State Alcoholism Program has long felt that there was a missing link between the paramedical team and the community team. It now appears that the link is to be found in alcoholism treatment departments in general hospitals. This is a paramedical service that can also be a part of the community team. Six general hospitals in

(Continued on Page 86)


How long will it take him to recover from the flu if he just doesn't care?

Does he really care?
s he alert, encouraged,
ositive and optimistic
bout getting out of bed
nd back to work soon?
Or is he giving in to
he depressing impact
f confinement?
When functional fatigue
omplicates convalescence,
lertonic can help...

Pleasant-tasting Alertonic is pipradrol hydrochloride—an effective cerebral stimulant whose gentle analeptic action helps counteract the apathy and inertia that so often delay convalescence—together with an excellent vitamin and mineral formula, in a satisfying 15% alcohol vehicle.

Nothing fosters confidence and a sense of well-being better than your own personal warmth, understanding and encouragement together with Alertonic to help insure prompt response.

Adequate dosage is important: Prescribe Alertonic—one tablespoonful t.i.d., 30 minutes before meals...tastes best chilled.

And for your patient's sake, prescribe Alertonic in the convenient, economical one-pint bottle.

Alertonic®

Available Only On Prescription

Each 45 cc. (3 tablespoonfuls) contains: alcohol, 15%; pipradrol hydrochloride, 2 mg.; thiamine hydrochloride (vitamin B_1) (10 MDR*), 10 mg.; riboflavin (vitamin B_2) (4 MDR), 5 mg.; pyridoxine hydrochloride (vitamin B_6), 1 mg.; niacinamide (5 MDR), 50 mg.; choline,† 100 mg.; inositol,† 100 mg.; calcium glycerophosphate, 100 mg. (supplies 2% MDR for calcium and for phosphorus) and 1 mg. each of the following: cobalt (as chloride), manganese (as sulfate), magnesium (as acetate), zinc (as acetate), and molybdenum (as ammonium molybdate).

*Multiple of adult Minimum Daily Requirement supplied.
†The need for these substances in human nutrition has not been established.

Indications: 1. Functional fatigue such as that often associated with: a depressing life experience or stressful time of life; advancing years; convalescence; limited activity or confinement. 2. Poor appetite and vitamin-mineral deficiency as they occur in: patients having faulty eating habits; geriatric patients who are losing interest in food; patients convalescing from debilitating illness or surgery.

Contraindications: As with other drugs with CNS stimulating action, Alertonic is contraindicated in hyperactive, agitated or severely anxious patients and in chorea or obsessive compulsive states.

Side effects: Reports of overstimulation have been rare. Patients who are known to be unduly sensitive to the effects of stimulant drugs should be observed carefully in the initial stages of treatment.

Dosage: Adults, 1 tablespoonful; children (over 15 years old), 1 to 2 teaspoonfuls; children (4 to 15 years old), 1 teaspoonful. To be taken three times daily 30 minutes before meals.

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Michigan now have alcoholism treatment departments: Hurley in Flint; Sparrow in Lansing; St. Joseph in Mount Clemens; St. Luke in Saginaw; Battle Creek Sanatorium in Battle Creek; and Memorial Hospital in Sault Ste. Marie. All of these programs were originally started in close cooperation with the state Alcoholism Program and five of them received state grants at least originally. Three of them are currently supported entirely by patient fees.

There is a wide variety in the programs in these hospitals, but they have one thing in common. Only physicians can admit patients to the hospital and only physicians can decide that a patient should be admitted to the alcoholism services.

Each of the hospital alcoholism programs helps the patient to understand his disease. They give him insight into possible causes and they concentrate on the reasons for alcoholic drinking. They help to make the patient aware of the fact that he suffers from an understandable disease and that there are millions of other people who also have the disease. They let patients know that the disease is treatable by a variety of methods and that many alcoholics have learned to live normal lives without alcohol. They provide a type of treatment that physicians cannot be expected to perform.

Hospital alcoholism programs do not provide complete treatment for alcoholics. They do not *cure* alcoholics. They act as an introduction to long term treatment which is actually provided by a member or members of the community "team."

THE EFFECTIVENESS OF general hospital alcoholism programs has not been documented.[3] Each of these programs knows of many ex-patients who are currently living productive lives and not drinking. Many of these ex-patients maintain contacts with the hospital programs and credit their recovery to the treatment that began in the hospital. All of these programs are well aware of their failures and relapses and re-admissions are not uncommon.

The hospital alcoholism program gives the physician a resource that is closely related to the detoxification treatment. Most patients enter the hospital because the excessive use of alcohol has left him in such physical condition that he needs hospital care. This is a time when he is most receptive to the understanding of the long-range aspects of his disease.

It is highly probable that many physicians see early symptoms of alcoholism in their patients but do not discuss this with them because the physician is not able to provide the needed treatment. The availability of a treatment resource may eliminate the problem and result in earlier diagnosis and treatment.

THE PHYSICIAN who has such a resource can logically diagnose the alcoholism, treat the physical damage of excessive drinking, and bring in a new resource that can bridge the gap to more complete treatment.

The staff of the Alcoholism Program hopes to assist five general hospital programs to establish new alcoholism programs in the next year.

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1. Today's Health Guide — American Medical Association — W. W. Bauer, M.D., Editor.
2. A part of the State Department of Public Health, formerly the State Board of Alcoholism.
3. A study is currently underway at Hurley Hospital.

See Page 61 for details about current MSMS Alcoholism Education Program. And see page 73 for editorial.

Physicians Invited to Conference On Smoking and Health, January 18-20

The Michigan Council on Smoking and Health, the U.S. Public Health Service and the Michigan State University will sponsor an Institute on Smoking and Health, January 18-20, at the Kellogg Center in East Lansing.

The Institute is designed to provide the latest information on smoking and health since the release of the Surgeon General's report in 1964. Sixty professional persons working full time in the area of health and education will participate.

William Knisely, Ph.D., Director of the Institute of Biology and Medicine at Michigan State, is chairman of the Institute.

The Institute will explore the natural and biological sciences, behavioral and social sciences, education, communications and mass media, community planning, organization, and legislation as they relate to smoking and health.

On Wednesday morning, January 18, the role of the natural and biological sciences will be discussed in room 106. Professor Knisely, Robert Daugherty, M.D., Cadillac, and D. Bonta Hiscoe, M.D., Lansing will be the speakers.

At lunch, Maurice Seevers, M.D., chairman of the Department of Pharmacology, University of Michigan, will review the current research on cardiovascular and respiratory diseases as they relate to smoking.

At 2:15 p.m. the role of behavioral and social sciences in smoking research will be studied. MSU Professor Dozier Thornton, U-M Professor James Swinehart, Robert Luby, M.D., Detroit, and Professor Elizabeth Wheeler, of Central Michigan University, will be the speakers.

Thursday, January 19, the morning session will explore the role of communication and mass media as they relate to smoking and health education. MSU Professor Erwin Bettinghaus, Bonnie Wolfram, M.D., Detroit, and Herbert Auer will speak.

Community planning, legislation, and the role of public and private agencies as they relate to smoking and health will be discussed in the afternoon.

At 8:00 p.m. Richard Bates, M.D., Lansing, will discuss the topic of smoking withdrawal clinics. The public is invited to this lecture in the main auditorium of Kellogg Center.

Friday morning, January 20, the topic will be the role of Institute participants in implementing programs in smoking and health education. Professor Wheeler and Benjamin Yep of the Michigan Council on Smoking and Health staff, will speak. Following this there will be small group meetings of the Institute participants. The Institute will close at noon.

Once Again, Galens Man Kettles To Help Needed Children

For 39 years medical school students at the University of Michigan have solicited funds from Christmas shoppers to help the needy. The young men are all members of the Galens Honorary Society, and their projects range from helping support the Children's Workshop at the University Hospital and buying Christmas presents for children patients to establishing loan funds for worthy students.

This year the Galens pledged $30,000 to provide a children's workroom in the new C. S. Mott Children's Hospital now under construction, according to Chuck Newton, Galens president, who is the son of Dr. and Mrs. Charles W. Newton of Ann Arbor.

PONTIAC DOCTOR ELECTED

The Michigan Association of Neuropsychiatric Hospital and Clinic Physicians recently elected officers for the coming year. They are: President, Robert A. Braun, M.D., Pontiac; President-Elect, Merlin C. Townley, M.D., Eloise; and Secretary-Treasurer, William E. Kirk, M.D., Ypsilanti.

Elected to the Council were Raymond E. Buck, M.D., Detroit; and Calvin C. Chen, M.D., Northville.

It works.

SUMMARY:

TREST® (METHIXENE HYDROCHLORIDE)

relieves G.I. spasm, hyperactivity and associated pain by directly antagonizing the parasympathetic nervous system.

Each tablet contains methixene hydrochloride, 1 mg.

INDICATIONS: Gastrointestinal Spasm and Hypermotility.

CONTRAINDICATIONS: Pyloric obstruction, gastric retention, obstructive organic disease of the gastrointestinal tract, organic cardiospasm, duodenal stenosis, stenosing peptic ulcer, and urinary bladder neck obstruction or prostatic hypertrophy are contraindications to the use of this drug.

WARNING: Overdosage produces anticholinergic side effects. Although the animal reproduction studies are negative, until there is clinical confirmation of safety in pregnancy, this product should not be used in women who may become pregnant unless in the opinion of the physician the benefits outweigh the risks.

PRECAUTIONS: Use only with caution in patients with certain types of cardiovascular disease, since anticholinergic drugs may cause arrhythmias. Extensive clinical studies of TREST have shown no evidence of glaucoma. However, the possibility exists that it can occur since it has been reported as a characteristic side effect of anticholinergic drugs. This product does not replace definitive treatment in organic gastrointestinal disease.

SIDE EFFECTS: Side effects are generally absent when TREST is used in the recommended dosage of 1 to 2 mg. three times daily. Uncommonly, allergy or sensitivity to the drug may be manifested by generalized rash or widespread desquamation. In case of prolonged or massive overdosage, dry mouth, blurred vision, and urinary retention, typical side effects common to anticholinergic drugs, may occur. Occasionally, sensitive patients may notice mild dryness of mouth or slight blurring of vision from doses of 2 mg. or more. Most patients tolerate single doses of 5 mg. without such side effects.

DOSAGE: The usual adult dosage is 1 mg. by mouth three times daily. If necessary, the dose may be increased to 2 mg. three times daily. Pediatric dosage has not been determined.

CAUTION: Federal law prohibits dispensing without prescription.

Puts the G.I. tract to rest

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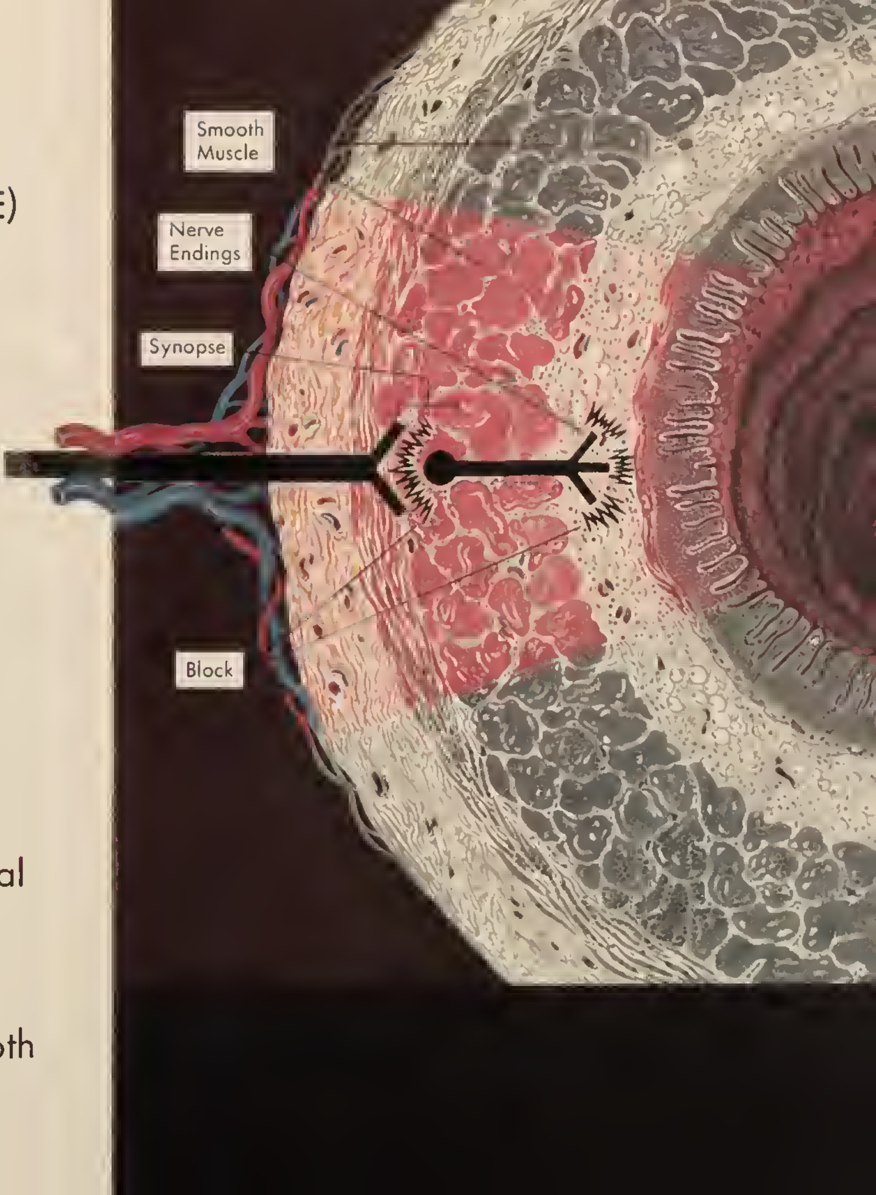
How TREST®
(METHIXENE HYDROCHLORIDE)
works.

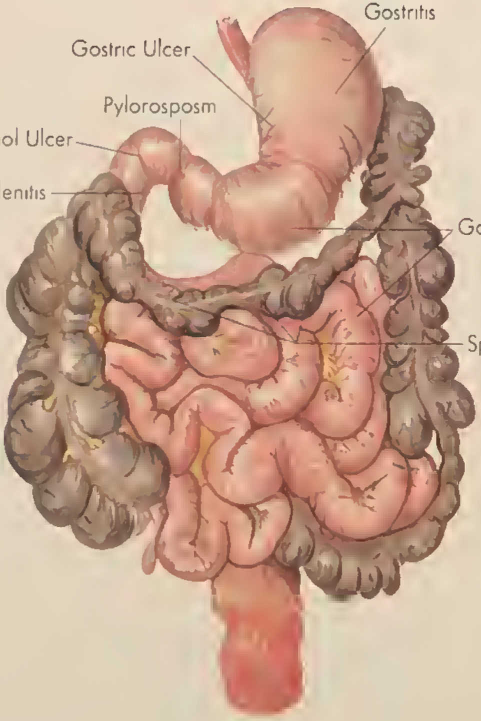

Smooth Muscle
Nerve Endings
Synopse
parasympathetic nerve
Block

TREST (methixene hydrochloride) directly antagonizes the parasympathetic nervous system.

TREST (methixene hydrochloride) blocks the action of acetylcholine formed at the synapses and visceral parasympathetic nerve endings.

Therefore, nerve impulses are prevented from reaching the smooth muscle layer.

TREST® (METHIXENE HYDROCHLORIDE) relieves gastrointestinal spasm, hyperactivity and associated pain in:


Gastritis
Gastric Ulcer
Pylorospasm
Duodenal Ulcer
Duodenitis
Gastroenteritis
Spastic Colon

Put the gut to rest with your prescription for TREST®

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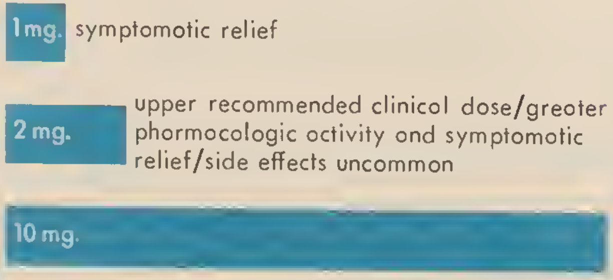
Evidence that TREST®
(METHIXENE HYDROCHLORIDE)
works.

EFFECTIVENESS AND SAFETY

t.i.d. dosage in milligrams



1 mg. symptomatic relief

2 mg. upper recommended clinical dose/greater pharmacologic activity and symptomatic relief/side effects uncommon

10 mg.

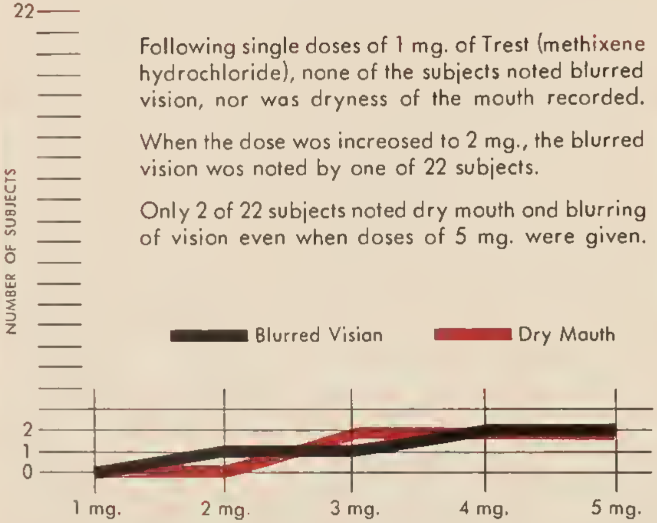
Studies with 372 subjects revealed no adverse effect upon vital organs when dosage was increased 10 times the normally effective dose of 1 mg. t.i.d. for periods up to 2½ years of continued administration.

LACK OF SIDE EFFECTS

Following single doses of 1 mg. of Trest (methixene hydrochloride), none of the subjects noted blurred vision, nor was dryness of the mouth recorded.

When the dose was increased to 2 mg., the blurred vision was noted by one of 22 subjects.

Only 2 of 22 subjects noted dry mouth and blurring of vision even when doses of 5 mg. were given.



Conclusion: Typical atropine-like side effects are not expected when Trest is used 1 mg. t.i.d. These effects are uncommon when the dosage is increased to 2 mg. t.i.d.

"A highly satisfactory symptomatic response was obtained in 20 of the 23 patients who took 1 mg. of methixene hydrochloride (Trest) by mouth three times daily. No side effects occurred at this dosage during administration of the medication itself.

"Methixene hydrochloride (Trest) provides highly gratifying symptomatic relief in a variety of conditions associated with gastrointestinal motility without producing the usual atropine-like side effects and without requiring concurrent barbiturate sedation."

—Martins, J. K.:
Clin. Med. 72:1313-1316
(Aug.) 1965.

". . . in a series of 47 patients suffering from various types of functional bowel distress. The superiority of this drug (Trest) in dosage of 1.0 mg. three times daily by mouth over the placebo is statistically significant. At that dosage level, side effects were not observed."

—Hufford, A. R.:
Clin. Med. 72:1151-1155
(July) 1965.

Saginaw Medical Society Helps Student Club

BY PETER HOHEISEL
OF MSMS STAFF

All physicians know they should be doing some-
ing to attract young people to the field of medi-
ne. But what? One man who has answered this
uestion for himself is William Mason, M.D., a
ginaw pediatrician.

Since 1961 Doctor Mason has held monthly
eetings in the conference rooms of Saginaw hos-
itals for all high school students interested in
edical careers. He believes in giving the young
eople the best specialists who can communicate
hat they do to the teenagers.

The night I was at the meeting, Robert Cris-
ell, M.D., a Saginaw plastic surgeon, was showing
ides illustrating the kind of cases he treats. The
ides were clear and to the point, showing the de-
rmities which people suffer, whether congenital
r the result of accident. Through them the young
eople could understand what the creative surgeon
n do to help his patients.

THIS IS WHY the young people were there —
learn about a profession dedicated to helping
eople.

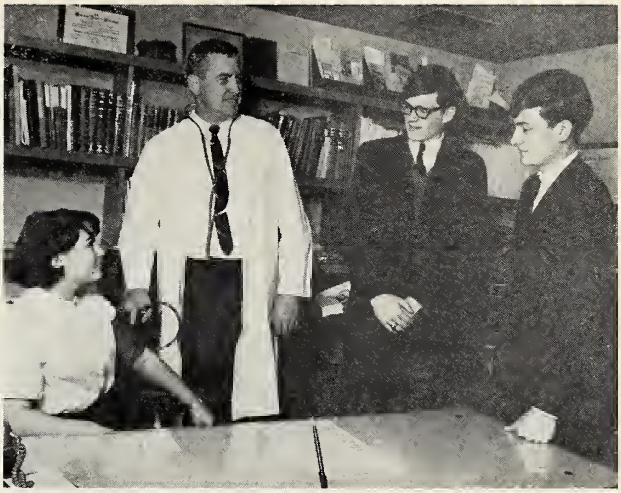
Doctor Mason holds the meetings at hospitals
ecause of his philosophy of giving the students
rst-hand information. They can take tours, visit
e laboratories, get the operation of a hospital
xplained to them by speaking to the people who
ork there.

Not all the young people in the club will go
nto the field of medicine, but as Doctor Mason
xplains, "When the time comes for them to make
career choice I want them to know something
bout the field of medicine so that they can make
n intelligent choice."

Once a year each senior in the club spends a
ay with a doctor. The doctor assigned to each
tudent meets him or picks him up and takes him
n his daily rounds. The student learns by seeing
nd doing and asking questions — not just by lis-
ening to lectures.

How can others set up such a club?

"It's simple," reports Doctor Mason. "First you
et the support of the county medical society.
Then you contact all the high schools and find out what students are interested in the field of medicine. Finally you set up a meeting at a hospital."



FUTURE PHYSICIANS: William Mason, M.D., first showed how to take blood pressure on Gayle Porter, daughter of Mr. and Mrs. Bernard C. Porter while Thomas Mahaney, son of Dr. and Mrs. Thomas P. Mahaney and William Rosenbaum, son of Mr. and Mrs. Gerhard W. Rosenbaum look on. Having learned their lessons well, young Tom Mahaney takes Gayle's pressure while Bill and Dr. Mason watch.

DOCTORS SOMETIMES give people the impression of constantly being in a hurry. After the meeting it was good to see Doctor Mason chatting with the young people about the field of medicine, answering their questions, being at their disposal for as long as they should want to speak to him.

When I asked several of the young people why they came to the meetings, I got many answers. "Because we learn a lot." "Because we want to learn about a profession that helps people." "Because they're cool."

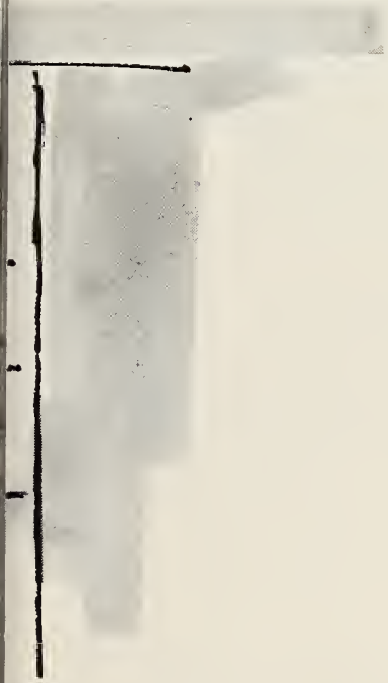
I think what they mean is that Doctor Mason is cool.

Several other county medical societies are working closely with Future Doctor Clubs in Michigan. All report the project as very worthwhile. Physicians and county societies interested in such activities may obtain guidance by writing to the MSMS Public Relations Committee.

MICHIGAN AUTHORS

R. L. Poucher, M.D., and T. J. Vecchio, M.D., both of Kalamazoo, "Absence of Tolbutamide Effect on Anticoagulant Therapy," *Journal of the American Medical Association,* September 26, 1966.

Henry E. Puro, M.D., Paul L. Wolf, M.D., John Skirgaudas, and Janice Vazquez, M.T., all of Detroit, "Experimental Production of Human 'Blue Velvet' and 'Red Devil' Lesions," *Journal of the American Medical Association,* September 26, 1966.



Wait, Annabelle. Mommy hasn't told the doctor yet that you *need* a shot.

e she does, maybe she ı't. But if her problem is congestion due to cold ergy, consider the medi- ı that combines conve- :e and effectiveness— ıistine Melet.

et is especially suitable treatment of children. It's asant tasting, chewable that leaves no aftertaste tty, undissolved particles in the mouth. It provides decongestant action almost as quickly as a liquid, but assures the accurate dosage of a tablet.

Because Melets are so convenient to carry and so easy to take at any time, adults, too, will appreciate this modern dosage form.

Use cautiously in individuals with severe hypertension, diabetes mellitus, hyperthyroidism or urinary retention. Caution adults who operate machinery or motor vehicles that drowsiness may occur. Each Melet contains phenylephrine hydrochloride 10 mg. and chlorpheniramine maleate 2 mg.

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MAP Officer Urges Doctors Save April 28-29

The Michigan Association of the Professions will hold its 1967 Annual Congress at Detroit's Statler-Hilton Hotel, April 28-29. The theme of the program and the speakers are soon to be determined by the planning committee.

MAP Vice-President G. B. Saltonstall, M.D., Charlevoix, urges doctors to mark their calendars now and plan to attend the 8th Congress.

"By meeting with other MAP members," Doctor Saltonstall states, "physicians can strengthen the close relationships which exist between the professions by virtue of their everyday work." "In so doing," he continues, "physicians help not only themselves and their profession, but contribute to others' welfare as well."

Research Re Tobacco

The AMA-ERF research project on tobacco and health was initiated in 1963. The project seeks to determine which significant human ailments may be caused or aggravated by smoking, how they may be caused, the particular element or elements in smoke that may be the causal or aggravating agents, and methods for the elimination of such agents.

Funds for this program have come from two sources. Initially, the AMA allocated $500,000 to launch the project. Subsequently, six major tobacco companies pledged $10 million over a five-year period without restrictions of any kind, except that the money be used for research on tobacco and health.

Since the program's beginning, over $2 million has been awarded for these purposes. Sponsored research has included investigations of fundamental behavior in smoking, the effects of nicotine on cardiopulmonary function, and pulmonary defense mechanisms against carcinogens.

MEDICAL CARE IN RUSSIA

Forty-two Nebraska doctors recently returned after making a five-week tour of European medical centers. Commenting on conditions in Russia, several said that they had found the medical standards "almost unbelievably low."

They said that they saw antiquated equipment and outdated procedures, frequently decades behind those used in the United States. They added that the well-trained doctors in the Communi world seemed depressed by what they had to wor with.

The doctors' study tour was sponsored under th People-to-People Goodwill Program.

ANOTHER COUNTY RECHARTERED: The Macomb Count Medical Society was recently rechartered by MSMS Presiden C. Allen Payne, M.D., third from left, and MSMS Counci Chairman Robert J. Mason, M.D., at far right. Also participating in the recent ceremonies were Charles M. Ebne M.D., county president, and Gerald W. Morris, M.D., secretary

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rug Industry Cuts hildren's Aspirin Limits

The pharmaceutical industry will comply volun- rily with a government request that the number candy-flavored children's aspirins per bottle be nited to 25.

A limit of 50 tablets per bottle was agreed upon a government-industry conference in 1955 and s been observed by producers of 95 per cent of l children's aspirins. However, some authorities nsider this number now to be dangerous, even thal under some conditions, when taken by a ild.

Instead of including a number-per-bottle limita- on on children's aspirin in a "child protection" ll, the House Commerce Committee urged that e Food and Drug Administration seek voluntary operation from the aspirin industry. The spokes- an said the industry would cooperate and that one-quarter grains generally has been accepted a non-hazardous amount.

An expert is a person who avoids the small rors as he sweeps on to the grand fallacy.

Benjamin Stolberg

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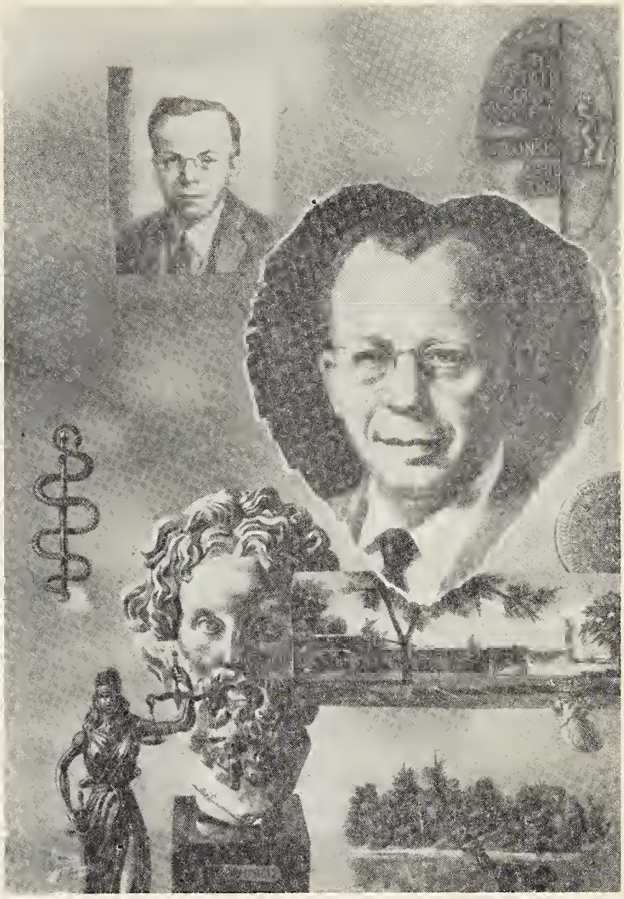

Wisconsin Medical Executive Honored; Served 25 Years

MADISON, WIS. — Charles H. Crownhart, for 25 years the secretary and general manager of the State Medical Society of Wisconsin, was honored recently by more than 500 guests at a reception.

A highlight of the event was the presentation to "Charlie" of his portrait, painted by the famed artist-in-residence at the University of Wisconsin, Aaron Bohrod. The gift was a climax to Crownhart's long years of admiration of Bohrod's work, as a cover artist for *Time,* as represented in the world's major museums, and as the man who was commissioned by Eli Lilly & Co. to do a series of eight paintings on medical specialties.

The portrait includes items of importance in Crownhart's life: a likeness of his late brother, George, whom he succeeded in office; seals of the Society; its office building in Madison; a bust and staff of Aesculapius; the scales of justice, symbol of the legal profession; and an island retreat in northern Wisconsin owned by the Crownhart family.

Asks Doctors To Help Curb Narcotic Thieves

Federal officials have urged physicians to take every precaution, to help cut the record thefts of narcotic drugs during 1966. Commissioner of Narcotics Henry L. Giordano said, "Although most registrants provide adequate safeguards for their narcotic stocks, some registrants do not."

Section 151.471 of Regulation No. 5 requires that "narcotic drugs and preparations shall at all times be properly safeguarded and securely kept . . . ." Doctors of medicine who keep stocks of narcotic drugs must be constantly on the alert, and vigilance must be exercised to secure the proper safeguard and storage of narcotic drugs. The addicts, as well as the narcotic peddler, may resort to diversion of legitimate stocks as the supply of illicit drugs becomes restricted.

Standards for safeguarding narcotics can be secured by ordering Bureau Order No. 213 from the Treasury Department, Bureau of Narcotics, Washington, D.C. 20226.

Insurance Executive Sees Hold-Line Job

Insurance and medicine "share a parallel vision" of the job ahead of them, according to Blake T. Newton, Jr., president of the Institute of Life Insurance.

That job is "to make such a showing before the public of ability to perform technically and professionally — of making available to all of the people all of the quality care they need — that it becomes clearly apparent to the public that no further government involvement in health care is necessary."

"The objective is not that government must not expand its role, but that it need not, because that role is being fulfilled so well by private resources," he stressed in a talk at the recent meeting of the Association of Life Insurance Medical Directors of America, in New York.

SERVE 90 MILLION LUNCHES

Nearly 90 million lunches will be served to public school children in Michigan this year.

More than 2,000 schools participated in the school lunch program last year and they served 83 million lunches.

The lunch program is financed with federal funds and surplus agricultural commodities.

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ffer Scholarships to Doctors or Alcoholism Institutes

The Department of Public Health, Alcoholism ogram, will offer scholarships for two summer hools of alcohol studies in 1967. The Michigan oundation for Medical and Health Education ll provide two scholarships to Michigan physi- ans to attend one of these schools.

The Alcoholism Program will provide 35 schol- ships to Michigan residents to attend the one- eek Midwest Institute on Alcohol Studies held Toledo University, June 18-23 and 15 scholar- ips for Rutgers Summer School of Alcohol Stud- s, New Brunswick, New Jersey, June 25 - July 14.

Of special interest to physicians is the two-week ysicians Institute which runs concurrently with e first two weeks of the regular course program Rutgers from June 25, 1967 through July 7, 67. This Institute is for physicians who wish to informed about current research knowledge and nical practice in alcoholism. Two Foundation holarships and two Alcoholism Program scholar- ips will be provided for Michigan physicians to tend the Rutgers Physicians Institute.

During the past three years, twelve Michigan physicians have attended the Physicians Institute at Rutgers on scholarships provided by the Alcoholism Program and the Foundation. These physicians are: Walter G. Brovins, M.D., Ypsilanti; John W. Sherman, M.D., Saginaw; Charles W. Shipman, M.D., Midland; Jose M. Valverde, M.D., Ypsilanti; Louis Bendezu, M.D., Ypsilanti; Jose Llinas, M.D., Lansing; John C. Morris, M.D., Detroit; Jaime A. Pabilonia, M.D., Northville; Victor Azuela, M.D., Battle Creek; John J. Hsu, M.D., Pontiac; Donald J. Cady, M.D., Saginaw; and W. R. Slenger, M.D., Kalamazoo.

JUST ONE DRINK!

Even one drink can affect a person's ability to drive safely, says Dr. Herbert Moskowitz of the Neuropsychiatric Institute at the University of California. Dr. Moskowitz's study showed that a moderate dose of alcohol affects vision, hearing, perception and information-handling by the brain.

"Alcohol apparently interferes with the brain's ability to do more than one thing," Dr. Moskowitz comments. "And what ability could be more important for a complicated activity like driving?" he asks.

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AMA Convention Schedule

1967: Atlantic City, N. J., June 18-22; Houston, Nov. 26-29.

1968: San Francisco, June 16-20; Miami Beach, Fla., Dec. 1-4.

1969: New York, June 22-26; Denver, Nov. 30-Dec. 3.

1970: Chicago, June 21-25; Boston, Nov. 29-Dec. 2.

16,000 ADULTS IN MICHIGAN ENROLLED IN BASIC EDUCATION

The State Department of Education (SDE) reports that 75 school districts in the state are expected to conduct basic education classes for 16,000 adults this year.

The Adult Basic Education program was conducted in 62 school districts last year, serving 10,000 adults who had completed less than six years of school.

Michigan began the program in 1965 with 26 school districts and 4,000 adults participating. Michigan was one of only five states at that time which conducted basic education courses for adults. Now, all 50 states have such classes which are financed with federal funds.

Re Emergency Care:

"The dramatic increase in emergency cases h not been matched with dynamic efforts for a va upgrading of services."

"We know that emergency service can be e cellent. This has been proven in many commu ities. But there is no uniformity. In other are emergency services suffers from both lack of c ordination and lack of understanding about wh constitutes good care.

"A soldier wounded in the jungle of Vietna often gets quicker, more comprehensive emergen care than an accident victim on the open highwa or a farmer stricken by a heart attack."

—Charles C. Edwards, M.I
Director
AMA Division of Socio-
Economic Activities

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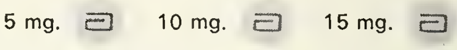


DESBUTAL® 10 Gradumet

10 mg. METHAMPHETAMINE HYDROCHLORIDE, 60 mg. SODIUM PENTOBARBITAL

DESBUTAL 15 Gradumet

15 mg. METHAMPHETAMINE HYDROCHLORIDE, 90 mg. SODIUM PENTOBARBITAL

MOOD ELEVATION

DESOXYN Gradumet

Smooth appetite control plus mood elevation

Typically, the obese patient is a repeat dieter. And with each failure, the task looks more hopeless. Therefore, it is often just as important to lift the mood as to curb the appetite. Desoxyn Gradumet does just that. It gently elevates and sustains the mood. And no other product—amphetamine or non-amphetamine—is more effective in suppressing appetite.

DESBUTAL Gradumet

For patients who can't take plain amphetamine

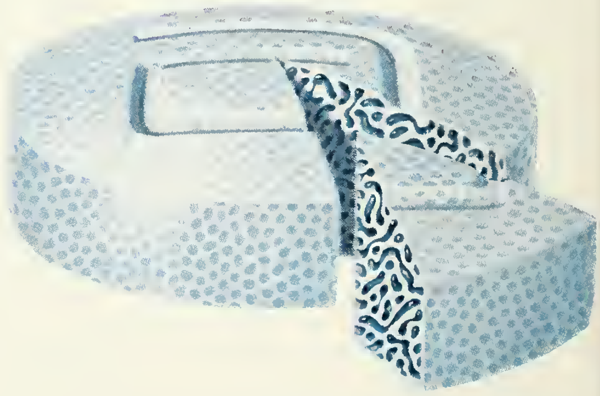
Desbutal Gradumet contains 2 drugs, each in its own tablet section, combined back to back to form a single tablet. One section contains Desoxyn to suppress the appetite and lift the mood; the other contains Nembutal® (pentobarbital) to soothe the patient and counteract any excessive stimulation. The drugs are released in an effective dosage ratio throughout the day.

CONTROLLED-RELEASE

HOW IT DIFFERS FROM LONG-RELEASE

The Gradumet is made up of thousands of interconnecting channels, much like a sponge. These channels—filled with a drug—end at the outer surface of the tablet. When fluid comes in contact with the Gradumet, the drug in the outer ends of the channels dissolves. As the fluid makes its way up the channels, there is a continuous release of medication.

Since the rate of release is rigidly determined by the size and number of channels, the Gradumet is able to provide controlled-release as well as long-release. Patients get a measured amount of medication, moment by moment, throughout the day—from a single oral dose.



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THE PROGRAM

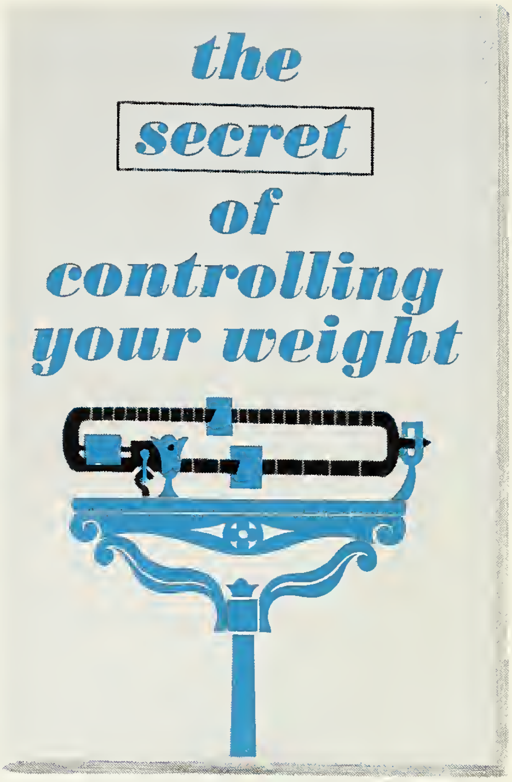
WEIGHT CONTROL BOOKLET

To help your obese patients understand why they are overweight—and what they can do about it—Abbott has a booklet called "The Secret of Controlling Your Weight." *It is available to your patients only through you.*

Here is a partial list of the topics covered:

Why you are overweight
Rewards of weight reducing
Balanced meals
Helpful hints
Hunger between meals
Snacks
Weekly weighings
Exercise
Holidays, vacations, special events
Leanness and longevity

Each topic is covered on one page in simple and easy-to-understand language. At the back of the booklet, there is a list of 160 foods showing their caloric content.



FOOD DIARY

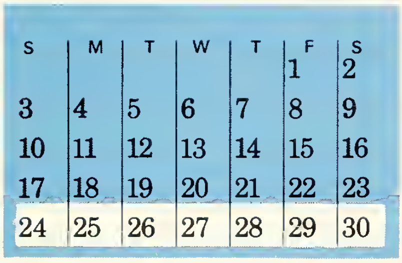
The Food Diary is designed to help the overweight patient follow your eating instructions. Space is provided for breakfast, lunch, supper, and even snacks. By writing everything down that's eaten each day, the patient is constantly reminded that she's trying to change her eating habits. And you are furnished with a written record of how well she's doing.

This booklet also lists the caloric content of 160 foods.

See Brief Summary on next page.

THE PRICE

ECONOMY



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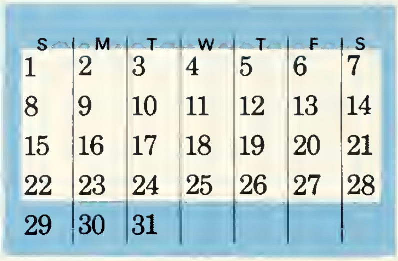

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29	30	31				

Desoxyn Gradumet and Desbutal Gradumet are so reasonably priced that patients in many cases save enough (compared to other leading long-release anoretics) to get five weeks of medication for the price of four.

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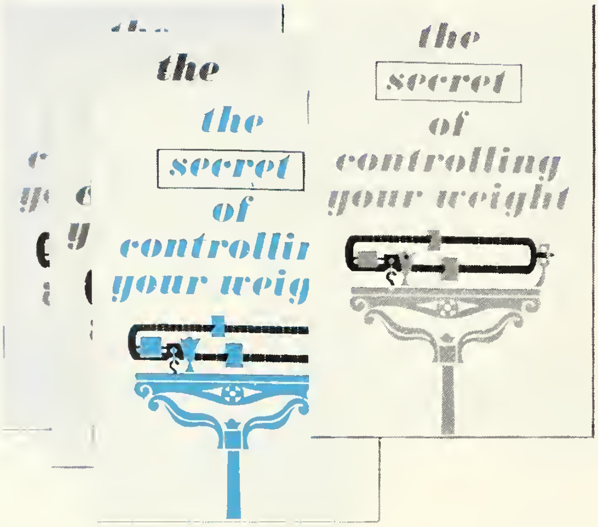

There are four weight control booklets, each with the same text, but with a different sample in the back of the booklet to meet your individual patient's needs. You have your choice of Desoxyn Gradumet in 10 mg. or 15 mg. strengths as well as Desbutal 10 Gradumet and Desbutal 15 Gradumet. The Food Diary is the same for all of the weight control booklets.

Your Abbott man will be happy to supply you with booklets. Just ask him.

CONTRAINDICATIONS: Methamphetamine (in Desoxyn and Desbutal) is contraindicated in patients taking a monoamine oxidase inhibitor. Do not use pentobarbital (in Desbutal) in persons hypersensitive to barbiturates.

PRECAUTIONS, SIDE EFFECTS: Observe caution in patients with hypertension, cardiovascular disease, hyperthyroidism, old age, or those sensitive to sympathomimetic drugs. Prolonged usage may lead to tolerance or psychic dependence. Careful supervision is necessary to avoid chronic intoxication and addiction.

Amphetamine side effects such as a headache, excitement, agitation, palpitation or cardiac arrhythmia usually may be controlled by reducing the dose. Paradoxically-induced depression is an indication to withdraw the drug. Pentobarbital (in Desbutal) may cause skin rash. Nervousness or excessive sedation with Desbutal is usually transient.

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Gradumet—Long-release dose form, Abbott: U.S. Pat. No. 2,987,445.

W. Leonard Howard, M.D., left, Northville, receives the ruce H. Douglas Award from William Steininger, M.D., pre- nted by the Michigan Thoracic Society in recognition of tstanding contribution in the field of tuberculosis treat- ent or control in Michigan.

Here's How Auxiliary Idea Was Born . . .

"In a vigorous pioneer country where a state was being formed, where the Santa Fe Railroad was cutting into the southwest and transportation was changing from open buckboard and buggy to horseless carriage and trolley car, a new chapter was added in the development of organized medicine.

"The year was 1907 and Oklahoma was still the wild west. Legal steps had been taken toward statehood, and in anticipation of this accomplishment, the territory's doctors were planning to meet to amalgamate the Indian Territory and the Oklahoma Territory medical associations as a state medical association. The convention was to be held in Shawnee in May.

"One night in April, Dr. Walter C. Bradford of Shawnee came home and announced to his wife that the gallant MDs would allow their wives to come along to the meeting. He added, however, with some bewilderment: 'What in the world will we do with them?'

"Mrs. Bradford did what most wives would do under the same circumstances. She thought for a minute and forthwith called a meeting at her home of the wives of Shawnee physicians. Thus was born, nearly 60 years ago, the first auxiliary to a medical society."

—from *MD Wife*
Vol. 27, No. 5

NA President Explains ursing Education Stand

The new policy position of the American Nurse ssociation on nursing education was explained by NA President Jo Eleanor Elliott, R.N., at the ecent convention of the Michigan Nurse Associa- on.

She voiced her pleasure with the AMA policy iat nursing education should take place in educa- onal institutions, such as colleges or universities, reparatory to licensing as an R.N.

The present trend, she said, is two-fold. There the junior college program where nursing stu- ents prepare for an Associate Degree. And there the baccalaureate program now in operation at x Michigan educational institutions including ichigan State University, University of Michigan, ayne University, Mercy College of Detroit, Naz- reth College at Kalamazoo and Madonna College t Livonia.

ANA's stand on nursing education, she said, does ot mean that all hospital diploma schools of nurs- g should close immediately. But it points the di- ection for developing new schools.

Miss Elliott told the Michigan nurses that the hangeover will be a gradual process during which "hospital diploma schools will eventually phase out and nursing education will become a part of the mainstream of American life."

Hopefully, she said, higher salaries for nurses will attract more scientific-minded boys and girls into the nursing field. Many of these should aim at getting their doctorate in nursing, she said.

Miss Elliott envisioned more nurses serving as key faculty members at the graduate school level and as researchers contributing to the science of nursing.

Although there are more nurses today than ever before (650,000 in the U. S.), she said, the demand still exceeds the supply. Solutions for this problem are threefold according to Miss Elliott.

They include (1) attracting more high school students, including men, into the field, (2) bringing more former nurses back into their chosen field, and (3) getting non-nursing activities deleted from a nurse's duties.

Suggests Ways to Aid Worthwhile Causes

If you have money, how can you give it away wisely and get maximum pleasure from it? Financial counselors recommend that people first make provision for their personal necessities, obligations and emergencies before making investments or donations.

Once a man has arranged to take care of himself, a whole range of possibilities for giving is open to him. He will probably treat most of these routinely, with small donations here and there. This is the point at which most people stop — and the pleasure is missed.

To get the most out of your giving:

1. *Look around for a specific field or institution that interests you.*
2. *Evaluate the agencies or institutions to which you have narrowed your choice.*
3. *Take a hand in the project.*
4. *Invest in people and ideas.*

Look at the dreams of your prospective beneficiaries. Every imaginative man has a drawerful of dreams — things he would like to do if only he had the wherewithal. If there are no dreams, then the future is past. The dreams tell you where the organization or project will be tomorrow. If you like what you hear, particularly if what you hear is honestly self-critical, then, and only then, should you invest your gift.

Your gift is a token of faith, and faith ultimately makes it possible to overcome the seemingly insurmountable.

—Harry Levinson
Sept.-Oct. 1966
Think

DVM TELE-LECTURES CONTINUE

After a trial run last spring, MSU's Tele-Lecture courses are now a permanent part of the continuing education program for the College of Veterinary Medicine.

The courses are sent by telephonic transmission into 10 Michigan cities where area DVMs have come to view and hear recent work by specialists in various phases of veterinary medicine. Presentations include not only the voice, but the viewing of slides sent in advance of the program which are shown along with the dialog.

Centers utilized for the test program included East Detroit, Dearborn, Oak Park, Benton Harbor, East Lansing, Flint, Grand Rapids, Kalamazoo, Saginaw and Traverse City.

ANNUAL CLINICAL CONFERENCE
CHICAGO MEDICAL SOCIETY

March 5, 6, 7, 8, 1967
Palmer House, Chicago

THIS CONFERENCE WILL BE OF INTEREST TO ALL PHYSICIANS
The program is presented by leaders of medical thought in all fields of medical activity. It is designed to interest the generalist and specialist alike. THE OUTSTANDING LECTURE PROGRAM IS PLANNED TO KEEP US ABREAST OF SCIENTIFIC DEVELOPMENTS IN MEDICINE. In addition certain sessions will take cognizance of happenings in the political and social arena which are molding changes in the practice of medicine. All physicians, regardless of their field of interest, will find this program to be informative and useful.

For program or registration information address:

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You may be told that a new short-acting diuretic was found more effective than Hygroton in congestive heart failure—but this was when twice the manufacturer's maximum recommended dose was given.* At the maximum recommended dose for both diuretics, two tablets of Hygroton were far and away more effective than five tablets of the other diuretic in producing natruresis and weight loss. And at these dosages, Hygroton costs only ⅓ as much as the other diuretic.

Since the discovery of chlorothiazide, the trend has been away from short-acting, multiple-dose, high-cost diuretics. With Hygroton you can usually do the job with just one tablet a day, or every other day.

More than any of the newer diuretics, Hygroton brings dosage and cost of medication down to earth.

*Brest, A. N., et al.:J. New Drugs 5:329, 1965.

Hygroton®
chlorthalidone

Indications: Hypertension and many types of edema involving retention of salt and water. **Contraindications:** Hypersensitivity and most cases of severe renal or hepatic disease. **Warning:** With administration of enteric-coated potassium supplements, the possibility of small bowel lesions should be kept in mind. **Precautions:** Reduce dosage of concomitant antihypertensive agents by at least one-half. Discontinue if the BUN rises or liver dysfunction is aggravated. Electrolyte imbalance and potassium depletion may occur; take special care in cirrhosis or severe ischemic heart disease, and in patients receiving corticosteroids, ACTH, or digitalis. Salt restriction is not recommended. **Side Effects:** Dizziness, weakness, nausea, vomiting, hyperglycemia, hyperuricemia, headache, muscle cramps, postural hypotension, constipation, leukopenia, thrombocytopenia, agranulocytosis, impotence, dysuria, transient myopia, skin reactions, including urticaria and purpura, epigastric pain, or G.I. symptoms after prolonged administration. **Average Dosage:** One tablet (100 mg.) with breakfast daily or every other day. **Availability:** Tablets of 100 mg. in bottles of 100 and 1000. For full details, see the complete prescribing information. 6524-V(B)

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Geigy Pharmaceuticals
Division of Geigy Chemical Corporation, Ardsley, New York

Geigy

Read a Book Recently?

"Wake Up, Read!" is the challenge of the Detroit Public Library which has published a list of "101 significant books of the past century."

Several of them relate quite directly with medicine and physicians might like to re-read them.

Included are:

"The Descent of Man," Charles Darwin, 1871

"Principles of Psychology," William James, 1890

"The Interpretation of Dreams," Sigmund Freud, 1900

"The Story of Mankind," Hendrick Van Loon, 1921

"Coming of Age in Samoa," Margaret Mead, 1928

new members

Helen Radcenko, M.D., 302 West Pierson Road, Flint.

Jaime Ramirez, M.D., Providence Hosp., 16001 W. Nine Mile Rd., Southfield.

Donald D. Riker, M.D., 633 Archwood, Ann Arbor.

John H. Robbert, M.D., 70 Highland Road, North Haledon, New Jersey.

Ian Sayani, M.D., LaCroix Hospital, White Pine.

Richard K. Schaefer, M.D., Chev. Engine & Fab. Div., 3248 Van Slyke Road, Flint.

Flora Scherer, M.D., Box A, Kalamazoo State Hosp., Kalamazoo.

David W. Schmidt, M.D., 1512 Brooklyn Street, Ann Arbor.

Marvin E. Schrock, M.D., Pontiac Medical Bldg., 35 S. Johnson St., Pontiac.

Alan F. Schroeder, M.D., 6259 Potomac Street, San Diego, California.

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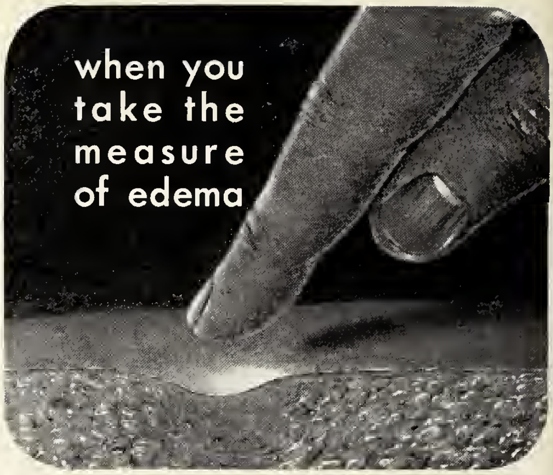

. . . introduce your patient to

AQUATAG®
(BENZTHIAZIDE)

AQUATAG (Benzthiazide) is a potent, orally active, nonmercurial, diuretic agent. It is effective orally in producing diuresis in edema states, where it is therapeutically comparable to mercurials given parenterally. AQUATAG (Benzthiazide) is mildly antihypertensive in its own right and enhances the action of other antihypertensive drugs when used in combination.

DIURETIC ACTION: Clinically, the oral administration of AQUATAG (benzthiazide) results in diuretic activity within two hours with maximal natriuretic, chloruretic, and diuretic effects occurring during the fourth, fifth and sixth hours. Maintenance of response continues for approximately 12 to 18 hours. Acidosis is an unlikely complication since therapeutic doses of AQUATAG (benzthiazide) do not appreciably increase bicarbonate excretion. Edematous patients receiving 50 mg. of AQUATAG (benzthiazide) daily for five days developed a maximal increase in the rate of sodium excretion on the first day, and maintained this high rate until depletion of excessive body stores of sodium.

In congestive heart-failure patients, AQUATAG (benzthiazide) produced the same weight loss, during a 48-hour treatment period as did a maximally effective dose of hydrochlorothiazide.

DOSAGE: Diuresis, initially 50 to 200 mg.; maintenance 25 to 150 mg., daily. Hypertension 50 to 100 mg. initially, adjusted to 50 mg. t.i.d. or downward to minimal effective dosage level

WARNINGS: Use with caution in the presence of renal disease as azotemia may be precipitated or increased. In patients with advanced hepatic disease, electrolyte imbalance may result in hepatic coma. Dosage of coadministered antihypertensive agents should be reduced by at least 50%. In cases of suspected electrolyte imbalance, serum electrolyte determinations should be performed and imbalance, if any, corrected. Stenosis or ulcer of small intestine have been reported with coated potassium formulas, and surgery has been required and deaths have occurred. Based on surveys of both United States and foreign physicians, incidence of these lesions is low and a causal relationship in man has not been definitely established. Until further experience has been obtained, the use of the drug in pregnant patients should be weighed against possible hazards to the fetus.

CONTRAINDICATIONS: AQUATAG (benzthiazide) is contraindicated in progressive renal disease or dysfunction including increasing oliguria and azotemia. Continued administration of this drug is contraindicated in patients who show no response to its diuretic or antihypertensive properties. Severe hepatic disease is a relative contraindication. (See "Warnings" above.)

PRECAUTIONS AND SIDE EFFECTS: Electrolyte imbalance with hypokalemia (digitalis toxicity may be precipitated), hypochloremic alkalosis and hyponatremia may occur.

Patients with cirrhosis should be observed for impending hepatic coma and hypokalemia. Other reactions may include blood dyscrasias, hyperuricemia and gout, nausea, jaundice, anorexia, vomiting, diarrhea, dizziness, paresthesia, photosensitivity and headache. Hepatic fetor, tremor, confusion and drowsiness are signs of impending pre-coma and coma in patients with cirrhosis. Insulin requirements may be altered in diabetes. AQUATAG (benzthiazide) should be used with caution post-operatively as hypokalemia is not uncommon. Potassium supplementation may be advisable pre- and post-operatively. There have been occasional reports of thrombocytopenia, leukopenia, agranulocytosis, aplastic anemia and precipitation of acute pancreatitis or jaundice.

Before prescribing or administering, read the package insert or file card available on request.

Available as 25 or 50 mg. scored tablets.

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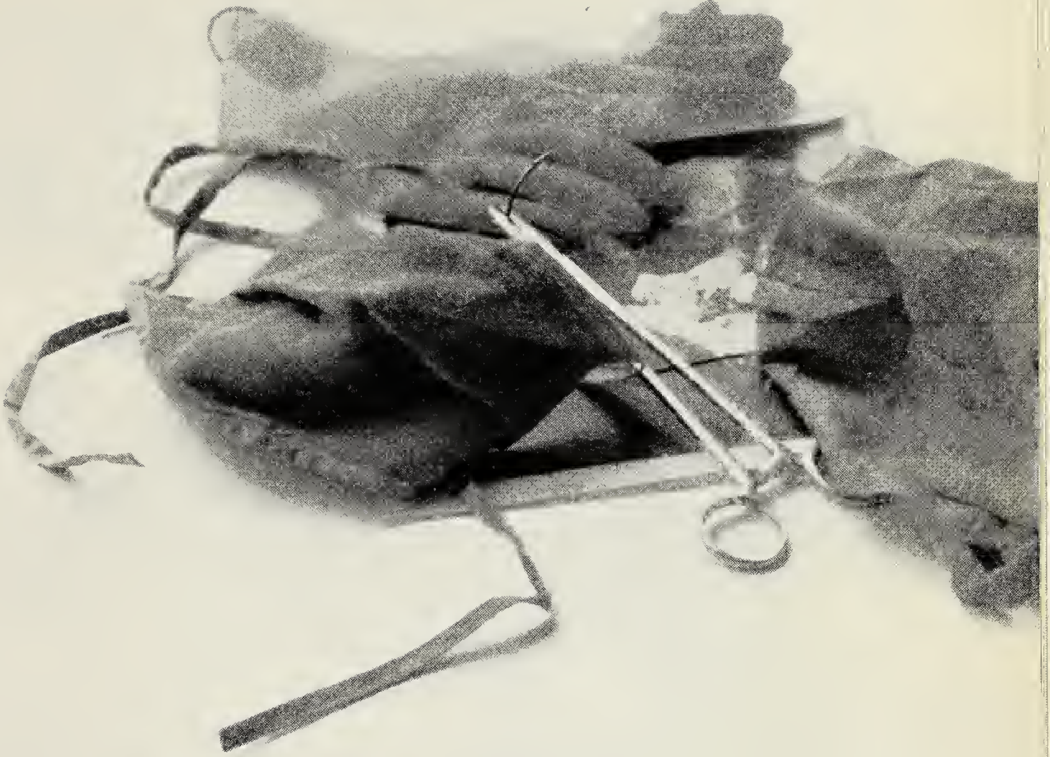

after
surgery

B and C vitamins are therapy: Therapeutic amounts of B and C in stress formula vitamins often are vital during periods of physiologic stress. STRESSCAPS capsules, designed to meet increased metabolic demands, aid in achieving a more comfortable convalescence, a more rapid recovery. After surgery, as in many stress conditions, STRESSCAPS vitamins are therapy.

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FOR PROFESSIONAL RECOMMENDATION ONLY

Each capsule contains:

Vitamin B_1 (Thiamine Mononitrate)	10 mg
Vitamin B_2 (Riboflavin)	10 mg
Vitamin B_6 (Pyridoxine HCl)	2 mg
Vitamin B_{12} Crystalline	4 mcgm
Vitamin C (Ascorbic Acid)	300 mg
Niacinamide	100 mg
Calcium Pantothenate	20 mg

Recommended intake: Adults, 1 capsule daily, for the treatment of vitamin deficiencies. Supplied in decorative "reminder" jars of 30 and 100; bottles of 500.

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STRESSCAPS

11,000 Foreign Doctors Training Now in USA

Approximately 11,000 MD graduates of foreign medical schools are now filling internship and residency positions in the United States and are thus contributing to the health care of U. S. citizens. Thousands more seek the opportunity to train in this country but cannot qualify.

The great number who qualify as well as those who try but fail testifies to the superiority of medical education in the United States. Whatever else may be said, they are here because they want to be.

At one time, there was no test of the qualifications of foreign MDs in training in this country. At the recommendation of the American Medical Association and other groups, the Educational Council for Foreign Medical Graduates was established in 1957 to develop a program to test foreign MD applicants for internship and residency positions in the United States.

The objective of the ECFMG program was to insure that these foreign MDs not only could speak acceptable English but more important that they would meet at least the minimum standards of education required of American MDs.

Ferris Building Honors Doctor

Ferris State College has paid tribute to the work of Glenn C. Bond, former Upjohn Company official.

Two new residence halls at Ferris were dedicated in the name of Glenn C. Bond, M.D., this fall.

Until his death August 26, 1965, Dr. Bond was Director of Control for the Upjohn Company of Kalamazoo. He also served as treasurer of the Ferris State College Board of Control. A Ph.D. in bacteriology from the University of Kansas, Dr. Bond had served as a faculty member at the University of Kansas and had taught in high schools in Oklahoma, Hawaii, and Kansas, before his appointment to the Upjohn Company.

The residence halls named in his honor will accommodate 560 students. These selected freshmen from the School of General Education are part of a "Living-Learning" project in which they take their classes in the same area where they eat and sleep.

NURSING BOOKLET OFFERED

A pamphlet named *How We Can Get the Nurses We Need* has been published covering hours, pay, prestige, working conditions and education of nurses. This publication by Ruth Carson is No. 385 in the Public Affairs Pamphlet series and is available for 25¢ from the Public Affairs Committee, 381 Park Avenue South, New York, N.Y. 10016.

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The reflector unit "floats" over the treatment table as the Equipoise Arm is extended with finger-tip ease—offering correct positioning to any treatment situation. Special Alzak finish and configuration of the reflector project the radiation evenly, and a detachable Localizer with 2-inch cone allows uniform focusing of radiation to small treatment areas. The high-intensity, balanced radiation of the UV-800 is rich in both bactericidal and antirachitic rays.

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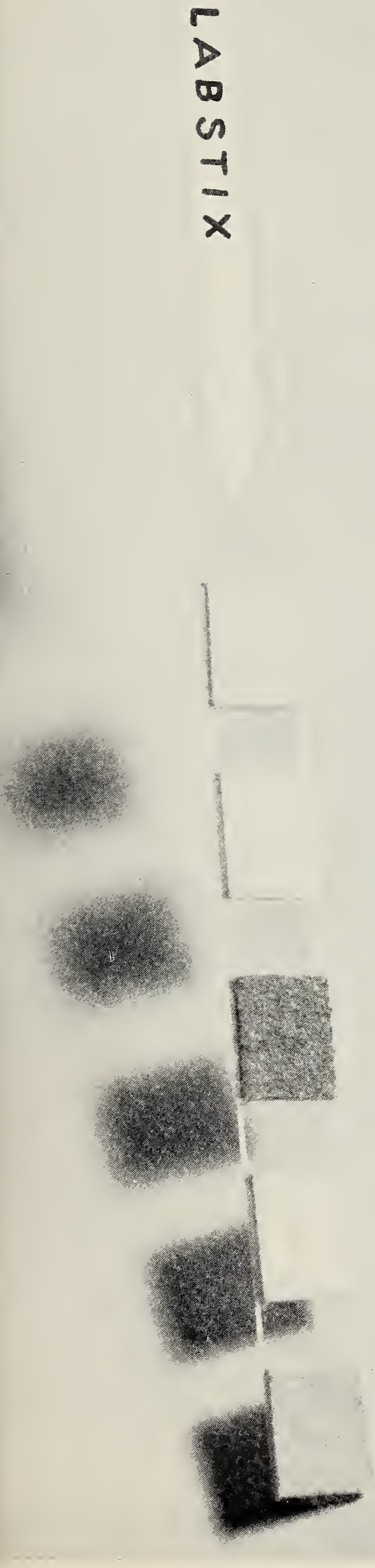
new from Ames 5 basic uro-analytical facts in 30 seconds



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...broadest urine screening possible from a single reagent strip

Urine test results with Labstix Reagent Strips can represent significant guides to differential diagnosis or therapy in many conditions. An unexpected "positive" may enable you to detect hidden pathology—long before more recognizable symptoms become evident. Negative results, which permit you to rule out abnormalities in a broad clinical range, can serve as baseline values for reference in future examinations. The 5 colorimetric test areas encompassed on Labstix Reagent Strips are:

pH—values are read numerically in the essential range of pH 5 to pH 9.

Protein—results are read either in the "plus" system or in mg. % in amounts approximating "trace," 30, 100, 300, and over 1000 mg. %.

Glucose—provides a "Yes-or-No" answer for urine "sugar spill."

Ketones—detects ketone bodies in urine—**both** acetoacetic acid and acetone. Reacts with as little as 5 to 10 mg. % of acetoacetic acid.

Occult Blood—specific test for intact red cells, hemoglobin or myoglobin. Results are read as negative, small, moderate or large amounts.

Now a Clear Reagent Strip of Firm Construction

...facilitates handling during testing procedure. Excellent color contrast made possible by the clear plastic strip, together with the clearly defined color charts provided, permits precise, reproducible colorimetric readings in all 5 test areas. A more definitive interpretation of uro-analytical facts is made possible.

Available: Labstix Reagent Strips, bottles of 100 (color charts are supplied with each bottle).

Ames Company, Inc., Elkhart, Indiana AMES

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DERM EXHIBIT IS WINNER

The top award for exhibiting original work in dermatology was presented to three Michigan researchers at the 25th Annual Meeting of the American Academy of Dermatology held recently in Bal Harbour, Florida.

Thomas K. Burnham, M.D., Gerald Fine, M.D., and Thomas R. Neblett, Ph.D., all of Henry Ford Hospital and Clinical Laboratories, were given the first-place award for original research on a new technique for detecting autoantibodies in certain connective tissue diseases.

U-M Student Wins AMA Essay Contest

Glenn W. Geelhoed, a student at the University of Michigan Medical School, is the first-prize winner of the AMA's national essay contest on medical ethics. The $500 Norman A. Welch Award was presented to Mr. Geelhoed at the AMA House of Delegates session during the clinical convention in Las Vegas.

A native of Grand Rapids, Geelhoed participated in the Medical School's special studies program for research during his freshman and sophomore years. He studied the effects of angiotensin infusion on renal secretion.

His winning essay was entitled "On the Profession of Medicine."

Visiting in the hospitality suite of the Michigan State Medical Society at Las Vegas during the AMA convention were, left to right, Mrs. Otto K. Engelke, Ann Arbor; Mrs. Luther Leader, Bloomfield Hills, wife of the chairman of the MSMS delegation; Mrs. Bradley Harris, Ypsilanti, wife of the President-Elect, and Mrs. and Mr. Glen W. Geelhoed, Ann Arbor. Mr. Geelhoed is the winner of the Welch essay contest.

Channel 56 Adds Another Medical TV Series

On Friday nights, beginning January 13, a fu hour of televised medical education will be avai able to physicians in Southeastern Michigan an Essex County in Ontario.

At 8:30 p.m., every Friday, Channel 56, und the sponsorship of Wayne County Medical Socie and Wayne State University Medical School, a ready presents a half hour of professional educ tion for doctors. The program is "for Docto Only."

From January 13 to April 21, a new seri of 15 half-hour programs will begin at 8:00 p. The new series will supplement the already exis ing show at 8:30 p.m.

Produced under the direction of the Universi of Western Ontario Medical School in Londo the new series will feature eminent U.S. and Can dian physicians in panel discussions of clinical su jects. Some of the topics in the series are: clinic management of shock; oxygen therapy; the anem patient; gallstones; the treatment of headache, i fections, glaucoma for all physicians; infectio mononucleosis; the use and abuse of the X-ray d partment; stroke rehabilitation; obesity; long ter management of the coronary patient; and obs trical emergencies.

Two Public Service Programs Provided by Kent

From Grand Rapids come two new Kent Coun Medical Society programs of public service— crash squad program, and a medical educati program which will give first aid training to poli and fire department instructors.

The crash squad program will put various pl sicians on 24 hour call to assist at disasters a emergencies when notified by law enforceme agencies. The project is designed as a public se ice, free of charge.

The other program of Kent County Medic Society will provide specialized training sessio for police and fire instructors in first aid. At a tw hour session every three months a specialist w discuss his field as it relates to rescue and first a

After attending these meetings, fire and poli officials will pass on the information to the m in their departments.

In the past the Red Cross provided the traini in this field. The new program will supplem and not replace the already existing Red Cr program.

Photo professionally posed

Mike expects a penicillin injection.
He's about to be pleasantly surprised.

His physician is going to prescribe an oral penicillin —Pen • Vee® K (potassium phenoxymethyl penicillin). It's usually so rapidly and completely absorbed that therapeutic serum levels are produced in 15 to 30 minutes. Higher serum levels generally last longer than with oral penicillin G.

Indications: Infections due to pathogens susceptible to oral penicillin G. Prophylaxis of rheumatic fever in patients with previous history of the disease.

Precautions: Skin rash, symptoms resembling those of serum sickness, or other manifestations of penicillin-allergy may occur. Measures for treating anaphylaxis should be readily available: epinephrine, oxygen and pressor drugs for relief of immediate allergic reactions; antihistamines and corticosteroids for delayed effects. Penicillin may delay or prevent the appearance of primary syphilitic lesions. Patients with gonorrhea who are suspected of concurrent syphilitic infections should be tested serologically for at least 3 months. Where lesions of primary syphilis are suspected, dark-field examination should precede use of penicillin. As with other antibiotics overgrowth of nonsusceptible organisms may occur; if so, discontinue and take appropriate measures. Treat β-hemolytic streptococcal infections with full therapeutic dosage for at least 10 days to prevent development of rheumatic fever or glomerulonephritis.

Contraindications: Infections caused by nonsusceptible organisms; history of penicillin sensitivity.

Composition: Tablets—125 mg. (200,000 units) and 250 mg., (400,000 units); Liquid—125 mg. (200,000 units) and 250 mg. (400,000 units) per 5 cc.

Wyeth Laboratories **Philadelphia, Pa.**

ORAL **PEN • VEE® K**
(potassium phenoxymethyl penicillin) Wyeth®

ow, now, Mrs. Forsythe, we've never lost a cold patient yet.

ıen she's experiencing acute discomfort from cold symptoms, it's small wonder the patient becomes distressed out her condition.

e will breathe easier when you prescribe Novahistine LP.

vahistine LP is a long-acting decongestant that helps restore normal mucus secretion and ciliary activity—physio-ic mechanisms which prevent infection of the respiratory tract. A dose of two tablets taken in the morning d repeated in the evening will usually keep air passages clear for 24 hours.

e cautiously in individuals with severe hypertension, diabetes mellitus, hyperthyroidism or urinary retention. ution patients who operate machinery or motor vehicles t drowsiness may result.

ch Novahistine LP tablet contains: phenylephrine hydroloride, 25 mg., and chlorpheniramine maleate, 4 mg.

OW **PITMAN-MOORE** Division of The Dow Chemical Company, Indianapolis

NOVAHISTINE® LP

For relief of nasal congestion.

Saxon

book reviews

"FERMENT IN MEDICINE" BY RICHARD M. MAGRAW

REVIEWED BY
C. T. HARDWICK, Ph.D.,
MSMS ECONOMIC CONSULTANT

In the preface, Dr. Magraw offers his thesis of the book around the statement that

> **Medicine is a social science and that the role he will play as a doctor is defined by society. He (the doctor) will then realize that many of the decisions now being made about medical care are essentially social and not purely professional.**

Pursuing the above proposition, the author proceeds to examine the contemporary issues pertaining to the "Medical Contract," "The Patient's Role," "The Physician's Role," "The Hospital," "The Third Party," and several other issues such as specialization, research and supporting workers.

In general, the book is well organized and the writing style flows easily for convenient reading. As a social scientist, the reviewer is not often surprised with the author's observation but some practicing physicians may read it differently.

The outline of the book is suggested with the following words: "We will need to consider individually and in relation to one another the following elements of medical care:

1. What is wrong: (a) the disease and (b) the complaint
2. The contract (or consultation)
3. The role of the patient
4. The role of the doctor
5. The relationship between the patient and the doctor."

The author briefly explained the doctor's role as seen by the social scientist and often evaluates the practice of medicine from the social viewpoint. Also, he dwells on the impact of hospitals in the practice of medicine. For example, he asserts that public attitudes are changing in favor of the hospital as a place to secure attention, especially the emergency room. Several reasons are cited such as: (1) patients are learning that a physician is immediately available in hospital emergency departments 24 hours a day and that they can receive adequate care there; (2) improved transportation makes patients more mobile and less dependent on house calls; (3) because of frequent moves, families often require medical care before they have established contact with a physician, and tl hospital emergency room is an obvious resourc (4) patients may not want to trouble their docto for a minor problem. Moreover, as has been er phasized throughout this book, the doctor th they are currently seeing may acknowledge on a limited or a special responsibility for their car

In a chapter called "Emerging Patterns of Me ical Care and Practice," the author points o evolving patterns with this list:

"1. Must be adapted from, and hence will derivatives of, the current patterns of practice, i cluding the existing institutions and traditions

2. Will reflect the changing needs and deman of patients and doctors under changing social co ditions

3. Will be influenced by medical education

4. May be limited by the availability of traine personnel

5. Will be structured by those segments of s ciety which have the political power to do so which have the knowledge necessary to lead."

Also, the author reports some changes are con ing about in the "social contract or understan ing" between the patient and doctors. The a rangements are going to be changed as far as th following features:

1. Comprehensiveness and continuity of care

2. Availability of care when needed

3. Teamwork among physicians so as to mak available a spectrum of special expertness

4. Financing of care, including the method payment by the individual patient (or agency and the mode of remuneration for the individu physician

5. Teamwork among all health professionals s as to offer a spectrum of health services

6. Continuing education and the avoidance professional obsolescence.

The author carefully points out that the p tients usually think about "cost and mode of pa ment" whereas the physician has to keep in min "high quality care."

Briefly, the comment is made that "organize medicine is, for the moment, weak and discredite in matters of social leadership." He suggests th physicians may have to work out new avenues expression.

No simple, ultimate answers are offered by th author but he closes with a challenge in thes words: "If we physicians are to assume leadershi in medical affairs, we too must go forward to th newer world."

Look how many ways
Thorazine®
brand of
chlorpromazine
# can help

	Tranquilizer	**Potentiator**	**Antiemetic**
Agitation	●		
Alcoholism	●		●
Anxiety	●		
Cancer patients	●	●	●
Severe neurodermatitis	●		
Drug addiction withdrawal symptoms	●		●
Emotional disturbances (moderate to severe)	●		
Nausea & vomiting	●		●
Neurological disorders	●		
Obstetrics	●	●	●
Pain	●	●	●
Pediatrics	●	●	●
Porphyria	●	●	
Psychiatric disorders	●		
Hiccups—refractory	●		
Senile agitation	●		
Surgery	●	●	●
Tetanus	●	●	

'Thorazine' is useful as a specific adjuvant in the above named conditions.

The following is a brief precautionary statement. Before prescribing, the physician should be familiar with the complete prescribing information in SK&F literature or *PDR. Contraindications:* Comatose states or the presence of large amounts of C.N.S. depressants. *Precautions:* Potentiation of C.N.S. depressants may occur (reduce dosage of C.N.S. depressants when used concomitantly). Antiemetic effect may mask other conditions. Possibility of drowsiness should be borne in mind for patients who drive cars, etc. In pregnancy, use only when necessary to the welfare of the patient. *Side Effects:* Occasionally transitory drowsiness; dry mouth; nasal congestion; constipation; amenorrhea; mild fever; hypotensive effects, sometimes severe with I.M. administration; epinephrine effects may be reversed; dermatological reactions; parkinsonism-like symptoms on high dosage (in rare instances, may persist); weight gain; miosis; lactation and moderate breast engorgement (in females on high dosages); and less frequently cholestatic jaundice. Side effects occurring rarely include: mydriasis; agranulocytosis; skin pigmentation, lenticular and corneal deposits (after prolonged substantial dosages).

For a comprehensive presentation of 'Thorazine' prescribing information and side effects reported with phenothiazine derivatives, please refer to SK&F literature or *PDR.*

Smith Kline & French Laboratories SK&F

In memoriam

Arthur W. Allen, MD, internist from Ann Arbor, died November 18 at St. Joseph Mercy Hospital where he had been a member of the staff since 1947. He was 49 years old.

Born in Peoria, Ill., Doctor Allen was awarded his medical degree from Northwestern University Medical School in 1943. He completed his internship at Cook County Hospital in Chicago. Doctor Allen became an assistant resident in internal medicine at St. Joseph Mercy Hospital, Ann Arbor, in 1947, and completed his specialty training there in 1949. He remained a member of the hospital's department of internal medicine until his death. Doctor Allen was also a clinical instructor at the University of Michigan School of Medicine.

Doctor Allen was a member of the American College of Physicians, the American Heart Association and the American Society of Internal Medicine.

During World War II Doctor Allen served as a battalion surgeon with the U.S. Army and was awarded the Bronze Star with cluster and the Purple Heart.

Among the survivors is a son, Arthur William Allen, Jr., who is a student at the University of Michigan Medical School.

Don L. Bishop, MD, 57, retired physician from Flint, died there November 18 in St. Joseph Hospital.

Born in Tonawanda, Kansas, Doctor Bishop received his medical degree from Washington University and served his residency in surgery at Hurley Hospital, Flint. Doctor Bishop was physician for the DuPont plant in Flint for 22 years before retiring in 1961. Prior to that he was on the medical staff of Fisher Body.

Doctor Bishop was a retired member of the Michigan State Medical Society.

Rufus S. Courtney, MD, 44, Mt. Clemens pathologist, died November 6 at Clinton Valley Hospital.

Born in Hampton, Va., Doctor Courtney was graduated from Meharry Medical College in 1947. Doctor Courtney was pathologist and director of laboratories at St. Joseph before entering private practice in Mt. Clemens in 1960. His medical a iations included the College of American Path gists, the International Academy of Pathology, American Association of Blood Banks and Michigan Pathological Society. Doctor Court was also a member of the American Cancer ciety and served as chairman of the Clinton To ship Human Relations Commission.

During World War II Doctor Courtney ser in the Medical Department as a pathologist.

J. Joseph Drake, MD, 79, a Detroit physic for 51 years, died November 25 in Ardmore H pital, Ferndale.

Doctor Drake was graduated from Wayne St University School of Medicine in 1915 and ser his internship at Harper Hospital, remaining its staff until his retirement in 1954. He was a a staff member at Crittendon Hospital and an associate surgeon at Children's Hospital. F lowing his retirement, Doctor Drake was associa with the medical department of Michigan B Telephone Company and subsequently with Detroit Blood Service, Inc.

Doctor Drake served in the army in World W I.

A Retired Member of the Michigan State M ical Society, Doctor Drake received its 50-Y Award in 1965.

George R. Goering, MD, Past President of Genesee County Medical Society, and Flint p sician for 57 years, died October 11 at McLa General Hospital. He was 83.

Born in New York, Doctor Goering was a 1 graduate of the Albany Medical College. Doc Goering's medical fraternity was Omega Epsi Phi. Before his retirement in 1962, Doctor Goer was affiliated with Hurley, McLaren General a St. Joseph's Hospitals, all of Flint.

During World War I Doctor Goering was sistant camp surgeon at Camp Grant, Illinois.

Doctor Goering was a Life Member of the Mi igan State Medical Society and in 1961 recei its 50-Year Award.

C. D. Munro, MD, Jackson's oldest physici who practiced there more than 60 years, d November 24 in Mercy Hospital. He was 96.

A native of Ontario, Canada, Doctor Mu received his medical degree from Wayne St

(Continued on Page 129)

“Take a laxative” is a harsh sentence

Although there are more than 60 ethical laxatives available for the constipated patient, many, unfortunately, do not really produce an effect much like a normal bowel movement. Instead they whip the bowel, torment it and leave it irritated, inflamed and exhausted.
On the other hand, Dulcolax provides a nearly normal movement. Through its unique contact action, it induces the kind of natural contraction waves of the colon necessary for gentle, complete, comfortable bowel movements.
For your next constipated patient, try Dulcolax—the laxative with the gentle touch.

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a gentle persuasion

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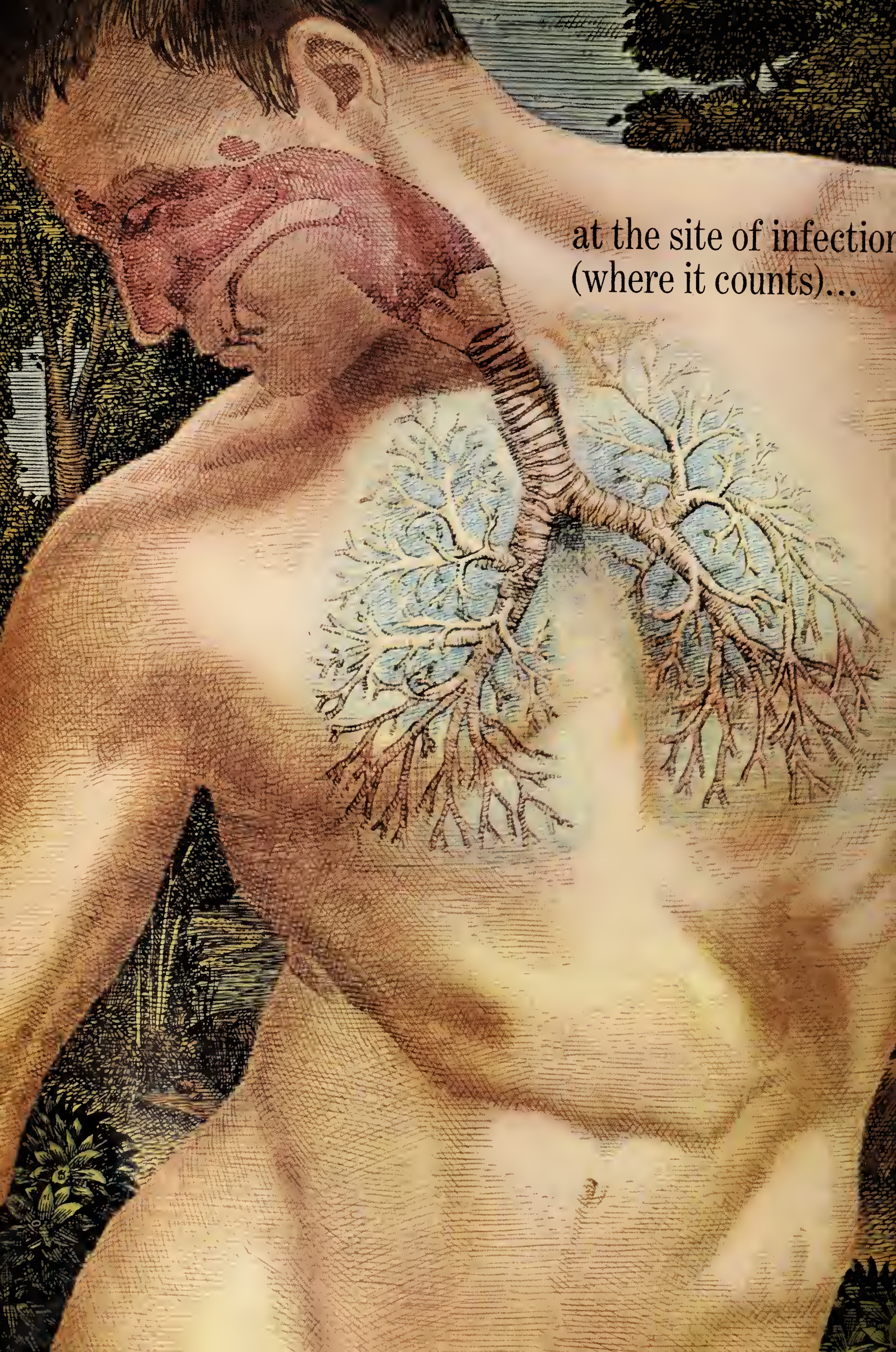

at the site of infectio
(where it counts)...

Ilosone® provides more antibacterial activity than any other oral erythromycin

Acid stable, better absorbed . . . Ilosone produces faster, higher, more prolonged blood levels, even in the presence of food[1-3]

Because it is the most active form of oral erythromycin, Ilosone can help assure consistently greater antibacterial activity at the site of infection. Ilosone produces peak antibacterial blood levels two to four times those of other erythromycin preparations.[1,2] Not only are these levels attained earlier, but they are maintained for much longer periods. Even the presence of food does not seem to affect the activity of Ilosone.[1,3]

In the treatment of patients with bacterial infections susceptible to erythromycin, Ilosone has compiled an excellent therapeutic record. Since it exerts its greatest activity against gram-positive organisms, it is particularly useful in common respiratory and soft-tissue bacterial infections. Ilosone kills—not merely inhibits—streptococci, pneumococci, and more strains of staphylococci than any other macrolide antibiotic. This bactericidal action, coupled with the high antibacterial levels attained, makes Ilosone especially valuable in patients with low host resistance, such as infants, debilitated individuals, and diabetics.

Ilosone has shown no cross-resistance with penicillin and may be effective against organisms that have become resistant to that agent. Despite its high antibacterial activity, Ilosone has demonstrated a low incidence of side reactions. Blood dyscrasias, ototoxicity, and tooth staining have not been observed. Infrequent cases of drug idiosyncrasy, manifested by a cholestatic jaundice, have occurred, but there have been no known definite residual effects.

700121

Ilosone®
Erythromycin Estolate

Lilly

(See next page for prescribing information.)

Ilosone®/the most active oral form of erythromycin

Description: Ilosone is the most active form of oral erythromycin that has been developed. Because it is stable in acid, well absorbed, and excreted in lesser amounts in the bile, it provides faster, higher, and longer-lasting levels of antibacterial activity (ABA) in the serum, even when taken with food, than do comparable doses of erythromycin.

Indications: Ilosone is indicated in infections caused by microorganisms sensitive to its action (especially staphylococci, hemolytic streptococci, and pneumococci). The drug is therefore useful in a high proportion of bacterial diseases encountered in clinical practice and particularly in the treatment of bacterial infections of the upper and lower respiratory tract and soft tissues.

In the treatment of acute bacterial pharyngitis and tonsillitis, this antibiotic has promptly eradicated the bacteria (streptococci) and has produced a parallel prompt clinical improvement. There have been no group A beta-hemolytic streptococci resistant to this preparation. In beta-hemolytic streptococcus infections, treatment should be maintained for ten days to prevent the development of rheumatic fever or glomerulonephritis.

Erythromycin estolate has proved to be very effective in pneumococcus pneumonia and in acute bronchitis with pneumococci on culture. Bronchopneumonia and otitis media in children have responded well to its use.

The antibiotic has been used very successfully in staphylococcus infections. Good therapeutic results have been obtained in soft-tissue infections, abscesses, cellulitis, carbuncles, wound infections, and furunculosis.

In serious staphylococcus infections, erythromycin preparations should be used only in combination therapy with other antimicrobial agents. As is the case with any treatment regimen used in these severe conditions, surgical procedures should be performed when indicated, and large dosages of the antimicrobial agents should be employed. In this fashion, Ilosone has been effective in staphylococcus pneumonia, osteomyelitis, septicemia, empyema, and meningitis.

Multiple 500-mg. doses of the drug have been useful in gonorrhea and syphilis. Since penicillin is the drug of choice for the treatment of syphilis and gonorrhea, erythromycin estolate should be employed for these infections only in patients with a history of penicillin allergy. Also, other infections due to susceptible bacteria in patients known to be hypersensitive to penicillin or other antibiotics may be considered for treatment with Ilosone.

Contraindications: **Ilosone is contraindicated in patients with a known history of sensitivity to this drug and in those with pre-existing liver disease or dysfunction.**

Side-Effects: Data obtained from seven years' use of propionyl erythromycin ester and erythromycin estolate (Ilosone) indicate that hepatic dysfunction with or without clinical jaundice may occur during or following courses of therapy with the drug.

Changes in liver function tests in such cases have been indicative of intrahepatic cholestasis. The symptoms appear to be the result of a form of sensitization. The initial symptoms have appeared in some cases after a few days of treatment but generally have followed one or two weeks of continuous therapy or several courses of the drug. Symptoms reappear promptly if the drug is readministered to sensitive patients, usually within forty-eight hours. Eosinophilia was noted in peripheral blood counts. The findings readily subsided without apparent residual effects when treatment was discontinued. Recovery was delayed in one reported instance. The physician indicated in this case that either drug-induced jaundice or viral hepatitis may have been responsible for the findings.

In one clinical study involving ninety-three patients treated with the antibiotic, three cases of jaundice were observed and an additional eleven cases developed some changes in liver function tests. Three of the patients had abnormal liver function tests a second time on readministration of the drug.

Even though it is assumed that not all cases of jaundice have been reported, it seems clear that the number is small compared with the amount of drug that has been used. Reported cases have included persons in whom there had been administered other drugs known to be associated at times with hepatic side-effects and cases in which the presence of viral hepatitis or other disease may have been responsible for the findings. In some of the cases, associated gastro-intestinal symptoms simulated the colic of biliary tract disease. In other instances, clinical symptoms and results of liver function tests resembled findings in extrahepatic obstructive jaundice. It appears that the occurrence of jaundice after administration of Ilosone is infrequent, but further investigations are being made to estimate its incidence more accurately.

In those cases mentioned above in which jaundice appeared to be definitely related to use of the drug, laboratory finding characterized by increased direct-reacting bilirubin, e alkaline phosphatase levels, negative or weakly positive c flocculation and thymol turbidity tests, elevated serum gl oxalacetic transaminase levels, peripheral eosinophilia, a mal cholecystograms.

Individual idiosyncrasy seems evident since jaundice l been reported in other patients taking prolonged courses medication. Patients with chronic infection have been giv to 2 Gm. of the drug daily for periods of two to six mont patients with rheumatic fever have taken prophylactic d 0.5 Gm. daily for two years without difficulty. In one gr 144 patients who received the drug daily for two years, n dice was noted. It was of interest that members of six o patients' families, who were not taking the drug, had e of jaundice during the study period.

Transaminase and serum alkaline phosphatase level determined in a group of fifty-four adults and children w 250 mg. of Ilosone daily for an average of sixteen mor rheumatic fever prophylaxis. The results were compare those of a similar group of forty-four patients who receiv icillin. There were no cases of jaundice in either group. El of SGPT and serum alkaline phosphatase levels during the of treatment was observed in one patient treated with and in two patients treated with penicillin. Seven other p in the group receiving Ilosone and four others in the pe group showed elevations in one of the tests at some time administration of the drugs.

Very satisfactory therapeutic results, without toxicity reported in 102 pediatric patients who received short-term day) courses of Ilosone in the treatment of streptococcus tions. Results of liver function tests in these patients wer parable to those in a similar control group who had r penicillin.

Gastro-intestinal disturbances not associated with hep fects are observed in a small proportion of individuals as a of a local stimulating effect of the medication on the alim tract; however, the normal intestinal gram-negative ba flora is not appreciably altered by erythromycin drugs.

Although allergic manifestations are uncommon with t of erythromycin, there have been occasional reports of urt skin eruptions, and, on rare occasions, anaphylaxis.

Administration and Dosage: Ilosone is administered orall

Ilosone Pulvules®
Ilosone Chewable Tablets
Ilosone Drops
Ilosone, 125, for Oral Suspension

For infants and for children under twenty-five pounds o weight, the usual dosage is 5 mg. per pound every six hou children twenty-five to fifty pounds, 125 mg. every six (Tablets Ilosone Chewable should be chewed or crushe swallowed with water.)

For adults and for children over fifty pounds, the usual of Ilosone is 250 mg. every six hours.

For severe infections, these dosages may be doubled.

When larger doses are indicated, parenteral erythr therapy should be considered.

In the treatment of syphilis, the recommended total do 20 to 30 Gm. given in divided doses for a period of ten to days. Close follow-up of the patient is necessary since e mycin drugs have not had adequate evaluation in all sta syphilis. Examinations of spinal fluid are recommended a of the follow-up therapy.

For gonorrhea, 500 mg. four times a day for four da recommended. In the treatment of gonorrhea, patients suspected lesion of syphilis should have a dark-field exami before receiving antibiotics, and monthly serologic tests be made for a period of three months.

How Supplied: Pulvules Ilosone, Capsules, N.F., 125 and 2 (equivalent to base), in bottles of 24 and 100.

Tablets Ilosone Chewable, N.F., 125 mg. (equivalent to in bottles of 50.

Ilosone Drops, 5 mg. (equivalent to base) per drop, in size packages, with dropper calibrated at 25 and 50 mg.

Ilosone, 125, for Oral Suspension, N.F., 125 mg. (equi to base) per 5-cc. teaspoonful, in 60 and 150-cc.-size pac

References: 1. Griffith, R. S., and Black, H. R.: Am. J. M. Sc., *247:*6
2. Griffith, R. S., and Black, H. R.: Antibiotics & Chemother., *12:*39
3. Hirsch, H. A., Pryles, C. V., and Finland, M.: Am. J. M. Sc., *239:*198,

Additional information available to physicians upon request.
Eli Lilly and Company, Indianapolis, Indiana 46206.

iversity School of Medicine. In 1900 Doctor unro went to London for postgraduate work. began practice in Jackson in 1901.

During World War I Doctor Munro served at fridge Field.

Doctor Munro was a Life Member of the Michn State Medical Society, and in 1947 received 50-Year Award.

A son, Nathan D. Munro, MD, is among the surors.

F. Janney Smith, MD, 77, chief of cardiology Ford Hospital for 37 years, died in that hospital vember 9.

A native of Baltimore, Md., Doctor Smith reved his medical degree from Johns Hopkins iversity in 1913. He came to Detroit and joined staff of Ford Hospital and was head of the ision of cardiovascular disease from 1915 to 4 and was staff consultant in cardiology from 4 until his retirement in 1963.

A Past President of the Michigan Heart Assotion, Doctor Smith was a member of the Amern Clinical and Climatological Association, a fellow of the American College and Climatological Association and the American College of Physicians. Doctor Smith was also a member of the American Heart Association and the Central Society for Clinical Research.

Doctor Smith served in World War I as a captain.

A Life Member of the Michigan State Medical Society, Doctor Smith received its 50-Year Award in 1963.

Noted and Quoted

(In his President's Page in the Oakland County Medical Society Bulletin, Worth W. Henderson, M.D., reported on the 1966 MSMS House of Delegates. In part, he wrote:)

"Since these meetings are open to the general membership of the State Medical Society, I would urge all members to take advantage of this privilege and attend at some time in the near future.

"As long as we can meet in free debate and arrive at well thought-out conclusions, we will continue to be a powerful well-run organization acting in the best interests of free medicine."

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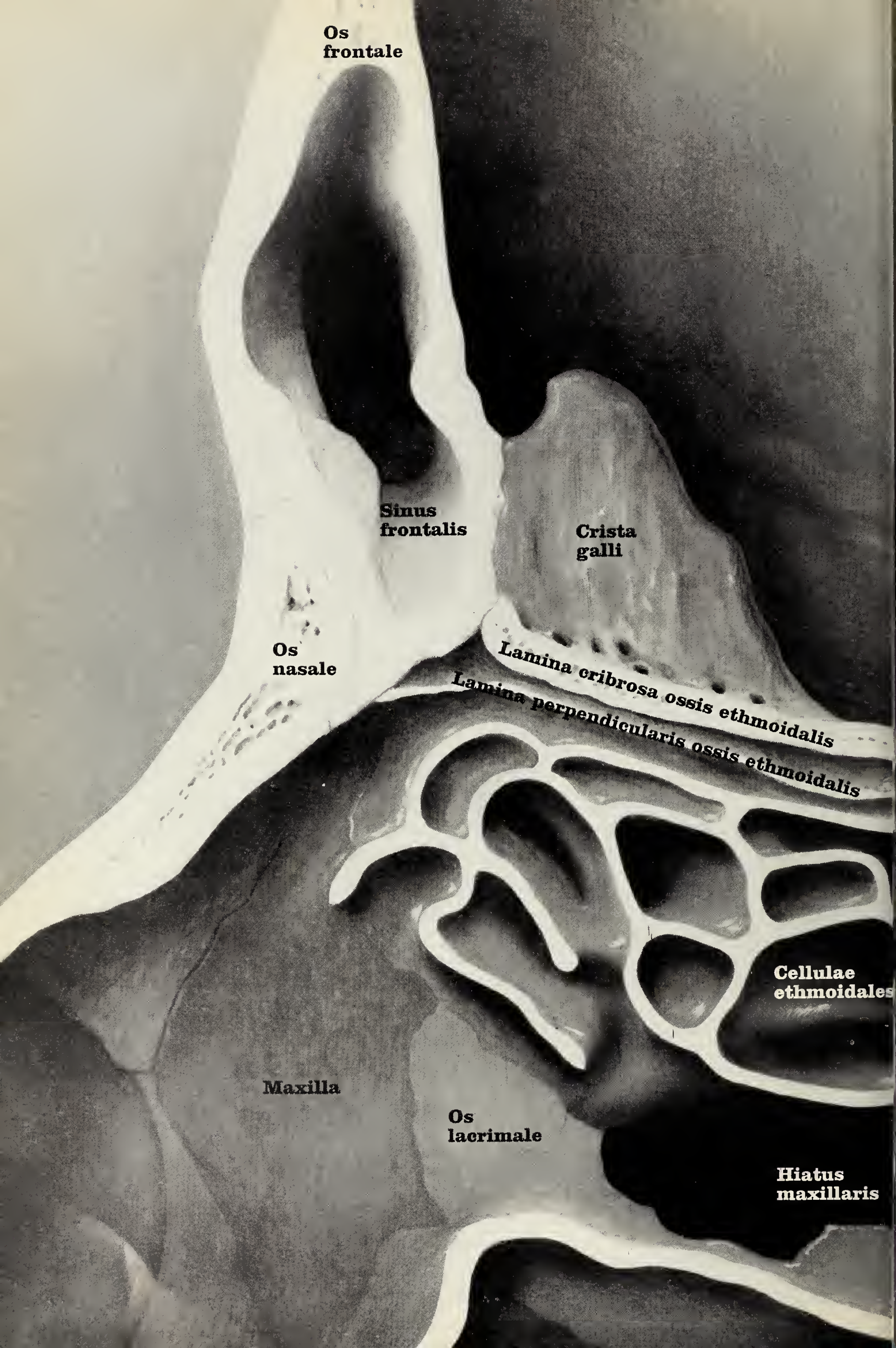
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Sinus headache is not a single entity, but a chain reaction of pain. It is facial pain—deep, dull, aching and nonpulsating. It is referred pain—originating in the nose and sinuses but felt at another site. It may become generalized pain and tension in head and neck. It is one or all of these. The Sinutab formula is designed for symptomatic relief of sinus headache. It provides two analgesics to relieve pain and discomfort...an effective oral decongestant to reduce mucosal congestion... and an antihistamine to help control allergic manifestations. *Side Effects:* Epigastric distress, drowsiness, dizziness, insomnia and nervousness. *Precautions:* Instruct patients not to drive or operate machinery if drowsiness occurs. Use with caution in patients with thyroid disease, heart disease, hypertension, diabetes or kidney disease. Excessive dosage or prolonged use may cause kidney damage. *Dosage:* Adults—2 tablets every 4 hours.

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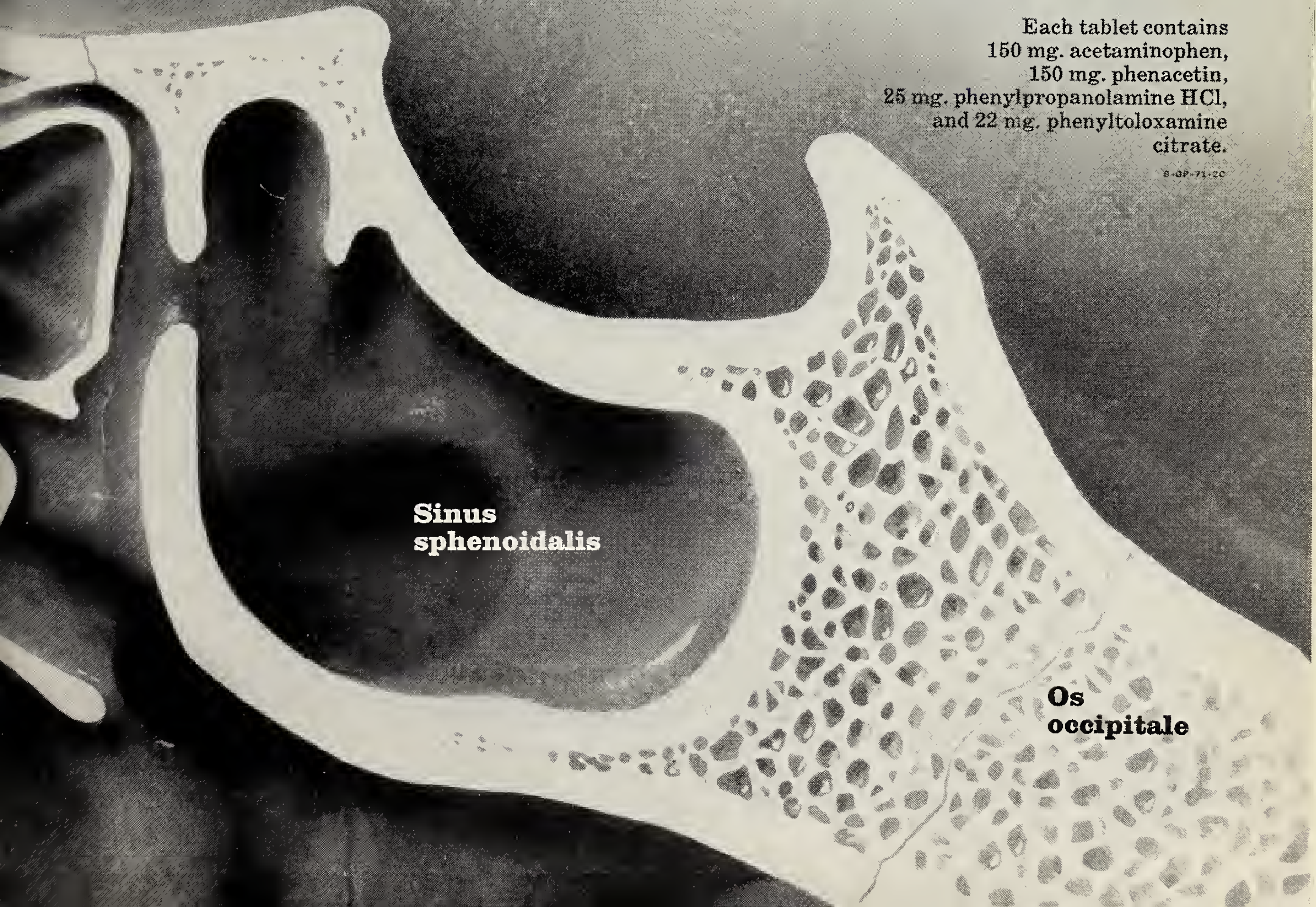

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d will be flexible enough to ac-
odate house and attending staff,
th.

abeth Sowa, M.D., the coordina-
f the program, has stated that
sessions can be arranged at times
convenient to the participants.
rder to facilitate arrangements
ime and composition of these
ngs, all interested parties are re-
d to contact Doctor Sowa,
e Eye Institute at WO 1-7927 or
it General Hospital Eye Clinic
O 1-7302, Extension 560. The
will go to hospitals within a
ile radius.

New Directory of Health Organizations Available Now from Health Council

Interested MSMS members may obtain a copy of the recently-published Michigan Health Council Directory of Michigan Health Organizations from the Michigan Health Council, Box 431, East Lansing.

The Directory contains, in its 160 pages, detailed information regarding more than 140 health, welfare and safety associations, societies and foundations. In addition, included in it is a special 40-page directory of health, safety and career films that are available free for showing to civic groups. The Directory also lists facts about health films which are available from national voluntary and governmental health agencies as well as information about the films available from Michigan organizations.

Prices for the Directory are $3.50 for single copies, three copies for $10 and ten copies for $30. Individuals and organizations interested in ordering larger quantities for distribution to their members, schools, churches, hospitals, etc. are urged to write or call the Michigan Health Council.

First Open-Heart Surgery Done in Central Michigan

A surgical team of doctors at Ingham Medical Hospital performed the first open heart operation in the medical history of Ingham county recently on a 15-year-old girl.

This is the first time that facilities have been available in Central Michigan capable of handling open-heart surgery. A heart-lung machine and supporting equipment were delivered to the hospital late in November at a cost of more than $50,000.

The hospital is one of five thoracic surgery training centers in Michigan. The others are Ford and Harper Hospitals, Detroit; University of Michigan Medical Center, and Veterans Administration Hospital, Dearborn.

LETTERS TO EDITOR INVITED; SEE PAGE 8

Top Spot for U-M Alum

Donald S. Fredrickson, M.D., an alumnus of the University of Michigan Medical School, has been named director of the National Heart Institute. Dr. Fredrickson succeeds Robert P. Grand, M.D., who died last summer.

Dr. Fredrickson, who led his Michigan Medical School class and graduated with high distinction in 1949, will be charged with the planning and direction of the National Heart Institute programs of government-supported research and training in the cardiovascular field.

DEPARTMENT OF MEDICINE HEAD NAMED AT MSU

Scott N. Swisher, Jr., M.D., professor of medicine at the University of Rochester School of Medicine and noted hematologist, will became chairman of the new Department of Medicine at Michigan State University on April 1.

Dr. Swisher is nationally known for his research in problems associated with blood transfusions and hemolytic anemia.

He received his MD degree in 1945 from the University of Minnesota and has been associated with Rochester since 1951.

Beg Pardon

In the August, 1966 issue of Michigan Medicine, under the title, "Time to Suggest Preschool Exams Now," page 618, a statement was made that indicated that children should be immunized against tuberculosis. This is an error. The statement should read that children should be given a tuberculin skin test. Although BCG vaccination is available, it is not recommended that this be used routinely for Michigan school children.

Classified Advertising

$5.00 per insertion of 50 words or less, with an additional 10 cents per word in excess of 50.

GENERAL SURGEON: Interested in group or solo practice in a community that needs a surgeon. Available July 1967. Military obligation fulfilled. Have had prior general practice experience before entering residency. Would prefer upper or middle portion of lower peninsula. Reply Box # 37, 120 W. Saginaw Street, East Lansing, Michigan.

MEDICAL HISTORIAN full time. (ECFMG required) Licensable in Michigan. For accredited 120 bed Detroit Hospital. Fluent English. Immediate opening. Family living quarters. Outstanding salary. Reply: Box 40, 120 West Saginaw Street, East Lansing, Michigan.

ANESTHESIOLOGIST: 38 years old, Board Eligible, University trained, Desire private practice, fee-for-service, will consider head of Department also. Reply: Box #1, 120 West Saginaw Street, East Lansing, Mich.

RENT OR LEASE: Space available, Fisher Bldg., Detroit, two days a week and evenings for qualified internist. Reply: Box 39, 120 West Saginaw Street, East Lansing, Mich.

Board Eligible INTERNIST just completed residency training including one year in hypertension and cardiovascular diseases. Seeks suitable opening as associate or full time preferably in Lansing or Detroit area. Reply Box #2, 120 West Saginaw Street, East Lansing, Michigan 48823.

EXCEPTIONAL OPPORTUNITY: Practice available in proven growth area located in heart of fishing and hunting country mid-Michigan. Office of recently deceased physician, fully equipped incl. X-ray, in small community. Presently without doctor. Ideal for 1 or 2 men. Hospital six miles. Contact: Mrs. Wm. D. Roth, 339 W. Brown St., Beaverton, Michigan. Area 517—435-7834.

"PHYSIATRIST, specialist in Physical Medicine and Rehabilitation, with many years experience in chronic disease as well as skilled nursing home activities, is interested in acting as a consultant in the geographical area of Wayne, Oakland and Macomb Counties. Kindly contact Box # 36, 120 W. Saginaw Street, East Lansing, Michigan."

NEWBERRY in need of General Practitioner and a surgeon. Population including surrounding area about 5,000. Excellent schools, churches of all denominations. Hospital opened February, 1966. An extended care Facility is being made available in former Hospital building. Newberry is a paradise for a fisherman or hunter. Contact: Administrator, Helen Newberry, Joy Hospital, Newberry, Michigan.

POSITION WANTED: Internist, foreign graduate, passed the first part of Internal Medicine Board, age 33, willing to do some G.P., seeks association or group practice in Southern Michigan. Reply Box #3, 120 West Saginaw Street, East Lansing, Michigan.

BOYNE CITY: General Practitioner urgently needed to serve this growing community located in the heart of Northern Lower Michigan. Excellent opportunity. Three Hospitals within close radius. For further information please contact: Dr. Richard L. Fish, Boyne City Chamber of Commerce.

GENERAL PRACTICE OPPORTUNITY: in association with three established General Practitioners in a community of 6,000 ten miles from State Capitol of Lansing, Michigan. Hospital privileges available at three hospitals. Salary and percentage leading to partnership. Contact: S. R. Robinson, M.D., 110 W. Jefferson, Grand Ledge, Michigan, Phone: 517-627-7172.

WANTED: Surgical resident for a
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February, and/or March, 1967. C
tact: Don F. Kudner, M.D., 766
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Cautions and Contraindications: No adverse effects on blood pressure, heart rate, and respiration have been reported. However, as is true for all medications of this type, PLEGINE (Phendimetrazine bitartrate) is not recommended for patients with coronary disease, severe hypertension, or thyrotoxicosis, and should be used with caution in highly nervous or agitated individuals.

Side Effects: There have been occasional reports of insomnia and nervousness. Rare instances of mouth dryness, nausea, blurring of vision, dizziness, constipation, and stomach pain have been noted.

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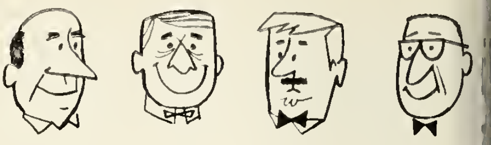
about doctors



Two members of the MSMS Woman's Auxiliary have been given awards for outstanding community service. They are Mrs. George S. Sayre, mayor pro tempore of Ypsilanti who won the Chamber of Commerce's 30th Annual Community Service Award, and Mrs. Harold A. Machin, first woman vice-mayor of Kalamazoo and the Quota Club's 1966 Woman of the Year.

Paul W. Gikas, M.D., Ann Arbor, will furnish traffic safety advice to Secretary John W. Gardner of the U.S. Department of Health, Education and Welfare. Dr. Gikas is one of 12 persons named to a committee to advise Secretary Gardner on the role of public health services in the national problem of traffic safety. He is chairman of the MSMS Committee on Highway Accident Prevention.

Horace W. Davenport, Ph.D., chairman of the physiology department at the University of Michigan, has been given one of the Alumni Distinguished Service Awards to be presented by the California Institute of Technology.

President of the 161-member Bay City Chorale is Frederick E. Brenner, M.D., Bay City. The singers, representing all vocations, presented, as their initial performance, the first section of Handel's "Messiah" during the Christmas season.

In Ferozepore, India, for volunteer work in the Frances Newton Hospital during November were Wesley Logan, M.D., Hastings, and Mrs. Logan. The Hospital, located in Northwest India near the Pakistani border, is sponsored by the Presbyterian Church. Dr. Logan was assigned to surgery and complicated obstetrics, and Mrs. Logan, a dietitian, taught student nurses.

Rosser L. Mainwaring, M.D., Dearborn, director of laboratories at Oakwood Hospital, has been reelected secretary of the American Association of Blood Banks.

Philip M. Bins, M.D., Detroit, spoke at the University of Leeds, England on "Recent Advances in ENT."

George Brown, M.D., Bay City, was presented a plaque by the Michigan Society for Crippled Children and Adults. Paul J. Abele, state president of MSCCA, made the presentation in recognition of Dr. Brown's twenty-five years' service as president of the Bay Chapter.

Busily preparing for an early spring meeting of the Canadian-American Medical and Dental Association is Tony Trapasso, M.D., Sault Ste. Marie, secretary-treasurer. The CAMDA meeting is scheduled for March 4-11 at Vail, Colorado.

Douglas A. Sargent, M.D., Grosse Pointe Park, has been appointed medical director of the Northeastern Wayne County Child Guidance Clinic. Dr. Sargent recently presided at the Third Annual Conference on Therapeutic Foster Care for Disturbed Children held at the Merrill Palmer Institute. There he reported on the Detroit Foster Homes Project which has been under his direction for the six years of its demonstration period.

Dale Kessler, M.D., Grand Rapids, chairman of the MSMS Socio-Economics Committee, will attend the First National Congress on Socio-Economics of Health Care, January 22-23, in Chicago.

and their friends

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From the State Capitol . . .

VOLUME 66, JANUARY 1967, NUMBER 2 — NEWS EXTRA — DEADLINE JANUARY 17

BY M. A. RILEY
MSMS LEGISLATIVE REPRESENTATIVE

SENATE LEADERSHIP ANNOUNCED

The Michigan State Senate, which for the next four years will be composed of 20 Republican and 18 Democratic members, has announced the selection of its leaders and the membership of its committees.

New Majority Leader will be Emil Lockwood, of St. Louis, assisted by Sen. Charles Zollar of Benton Harbor. President Pro Tem (presiding in the absence of Lieutenant Governor Millikin) will be Thomas Schweigert of Petoskey. He'll be assisted by Sen. Gilbert Bursley of Ann Arbor.

Responsible for leading the Republican Party on the floor: Robert Vander Laan of Grand Rapids, assisted by Milton Zaagman, also of Grand Rapids. On the minority side, Sen. Raymond Dzendzel now becomes minority leader, with the Democratic Caucus to be chaired by John McCauley of Wyandotte and the floor leader to be Sen. Sander Levin of Berkley.

HOUSE ORGANIZATION IN TURMOIL

Over in the House, Republican Rep. Robert Waldron, in the narrowest of votes, won the Speakership and his colleagues voted him two assistants, Rep. Martin Buth of Grand Rapids and Roy Spencer of Attica. Two close House elections are to be officially recounted. Although the Democrats in the House have named William Ryan of Detroit as Caucus Chairman, and former Speaker Joseph Kowalski of Detroit as minority floor leader, no one is proceeding to form committees. The House, with its 55 Republicans and 55 Democrats, is still in a turmoil and marking time until those two recounts are in the record books.

SENATE HEALTH COMMITTEES NAMED

Meanwhile, in the Senate, most medical legislative proposals are referred to the State Affairs Committee: Thomas Schweigert (R), Chairman, Harold Volkema (R) Holland, Vice Chairman, Gilbert Bursley (R), Michael O'Brien (D) Detroit and Charles Youngblood (D) Detroit. Another committee receiving much medical legislation is the Health-Welfare Committee: Mrs. Lorraine Beebe (R) Dearborn, Chairman, George Kuhn (R) Birmingham, Vice Chairman, Harry DeMaso (R) Battle Creek, George Fitzgerald (D) Detroit and Arthur Cartwright (D) Detroit.

FULL COMMITTEE LISTS DUE SOON

Several other Senate committees frequently are assigned bills of interest: the Judiciary Committee, the Corporations Committee (Blue Cross and Blue Shield bills), the Labor Committee (Workmen's and Unemployment Compensation), etc. The membership of all fifteen Senate Committees will be included in the next "Medigram" along with the membership of the thirty House committees and final details regarding House leadership.

A BUSY YEAR AHEAD

To date, without a full working day in the Legislature having yet passed, over 500 bills have been requested from the Legislative Service Bureau, indicating a probable high volume for the 1967 session. Details on all medical matters will be forthcoming as the bills are actually introduced.

In his opening message to the Legislature, Governor Romney alluded to health matters in several instances but left all details to special messages promised at a later date.

Discuss Blue Shield Future

Michigan Medical Service representatives and presidents of the county medical societies have held a series of three conferences to consider how Blue Shield can improve its service in the future.

Many Michigan communities expressed need for both general practitioners and specialists at the January 5 meeting of the MSMS Committee on Rural Medical Service. The MD Placement Service, operated by the Michigan Health Council, is attempting to alleviate the shortages that exist in some areas. Pointing out his own community is .R.E. Steele, M.D., Crystal Falls, who tells Robert E. Rice, M.D., Greenville, Committee Chairman, that three physicians in his area care for approximately 17,000 people.

Add: In Memoriam

In addition to the names reported in the January "In Memoriam" the following news has reached the MSMS office. Details will follow in the February issue of *Michigan Medicine*:

Russell A. Barnhardt, M.D., 59, Birmingham, died December 23.

Morris M. Burstein, M.D., 66, Detroit, died December 27.

Ethan B. Cudney, M.D., 71, Bloomfield Hills, died December 15.

John F. Jellema, M.D., 69, Holland, died December 13.

William Jend, M.D., 90, Detroit, died December 14.

Guy L. Loranger, M.D., 60, Detroit, died January 6.

Joseph P. Markey, M.D., 6
Saginaw, died December 8.

John W. O'Neill, M.D., 8
White Cloud, died December 2

Frank L. Pierce, M.D., 85, D
wagiac, died December 26.

William S. Summers, M.D., 8
Lake Worth, Fla., former lif
member MSMS, died January 2.

Siegfreid W. Thieme, M.D., 8
Ravenna, died December 7.

Henry J. Vanden Berg, M.D., 8
Grand Rapids, died January 1.

T. Wendell Williams, M.D., 4
Flint, died December 20.

Richard W. Watkins, M.D., Ben
ton Harbor, 76, died December

Extract of MSMS Council Minutes, Dec. 14

Upon recommendation of the Medicine and Osteopathy Committee, The Council authorized the MSMS Legal Affairs Committee to study and draft a proposed bill to create a uniform medical practice act in Michigan.

The Council approved tentative program and schedule of events, as recommended by the 1967 Annual Session Program Committee, for the annual meeting to be held in Grand Rapids next September.

In discussion of MSMS policy regarding screening tests, The Council referred to an appropriate committee a proposed resolution and other material which would serve as a basis for the development of a formal policy statement concerning the screening program.

The Council, upon recommendation of the Finance Committee, approved a 1967 budget.

The Council authorized its Advisory Committee to the Executive Director to report at the next meeting details of the negotiations with an individual who could become a part-time consultant in legislative affairs for the Michigan State Medical Society.

Legal counsel's report to The Council contained a review of the following opinions: Th
procedures when patient discharges his physician
bylaws with respect to active membership; procedures following charges of falsification of membership application and obligation re tax withholding for employee.

Resolutions referred to The Council by th
1966 House of Delegates action on the Annua
Report of the Committee on Evaluation of Prepaid Medical Services, referred the Utilizatio
Review Manual back to the original committe
for its recommendation in the light of the Hous
of Delegates actions.

The Council received for information a progress report on the Health Facilities Plannin
Council activities submitted by MSMS Representative D. Bonta Hiscoe, MD, Lansing.

The Council received a printed report fro
Michigan Medical Service concerning a meetin
planned with the MSMS Medical Advisory Committee and MSMS Representative Paul T. Lahti
MD, Chairman of the Committee on Governmental Medical Care Programs.

NATIONAL PRESIDENT

Ralph S. Green, M.D., Rochester, will be installed as President of the National Association of Private Psychiatric Hospitals at the Annual Meeting in Palm Springs, California, the week of January 23.

GPs to Confer March 15-16, Detroit

Plans have been announced for the 21st Annual Postgraduate Clinic of the Michigan Academy of General Practice, March 15-16 at the Sheraton-Cadillac Hotel, Detroit.

Noted speakers will conduct sessions on pediatrics, general medicine, fertility and female hormones, research and therapy.

In addition there will be both scientific and technical exhibits and a series of clinics for continuing education and instruction. Highlighting the Clinic's events will be the Annual Banquet in the Grand Ballroom, Wednesday evening, March 15.

Foundation Names Towsley As New Vice-President

The Michigan Foundation for Medical and Health Education on December 28 elected two new trustees to fill the unexpired terms of William A. Hyland, M.D., and Mrs. Katherine Miner.

Harry Towsley, M.D., of Ann Arbor, was elected to fill the vacancy created by the death of Doctor Hyland. B. James Theodoroff, vice president of Detroit Bank & Trust Co., will fill the layman opening created by the resignation of Mrs. Miner.

Dr. Towsley was also elected as Vice-President of the Foundation.

At present the Medical Foundation Board is studying ways of broadening its activities and objectives.

Save: New Medicaid Rules

MSMS members are provided the following information about the new coverage and payment regulations for physicians treating patients under the State Medical Assistance Program (Medicaid).

The new regulations, developed and released by the Michigan Department of Social Services, now gives the public-assistance recipients (Group I) full health and medical services. Full health and medical services for the medically needy (Group II) were scheduled for Jan. 1 but have been delayed.

Full implementation was delayed because costs of Medicaid were grossly underestimated by federal and state governments.

MSMS President C. Allen Payne, M.D., has expressed a concern and hope that the state legislature would re-evaluate the necessity for full implementation of this program.

New, Revised Rules Covering State Medical Assistance Programs

Effective January 1, 1967, medical assistance shall be available to "eligible recipients"* on the following basis:

"GROUP I" (Categorically Needy)

These recipients shall be eligible to receive:

1. Inpatient and Outpatient Hospital Services
2. Nursing Home Services and Care in Approved County Medical Facilities
3. Physicians' Services Anywhere
4. Home Nursing Services
5. Prescribed Drugs
6. Ambulance Service When Medically Authorized

"GROUP II" (Medically Needy)

These recipients shall be eligible for all above services EXCEPT THAT PHARMACEUTICAL SERVICES (prescribed drugs) AND PHYSICIANS' SERVICES SHALL BE LIMITED TO THOSE *PROVIDED IN THE HOSPITAL.*

CHECK CLOSELY, the recipient's identification card, to determine:

A. Expiration date

B. Group of service

The "Group of Service" will be shown in the box marked *"PROGRAM AND COUNTY CODE"* on the recipient's identity card.

PROVIDERS OF SERVICES are admonished to keep in mind that services rendered an ineligible recipient, OR unauthorized services rendered, OR services rendered on an expired eligibility will not be covered under TITLE XIX and payment for such services will have to be sought from another source.

*** ELIGIBLE RECIPIENT**

An "eligible recipient" is a person who presents an official Department of Social Services identity card, bearing their signature. This card, if not expired, establishes their eligibility for either Group I or Group II service as outlined above.

Should there be any question as to a patient's eligibility, it must be cleared at the county office of Social Services.

Title XIX will reimburse for only those services as shown above, and only when eligibility of the recipient is properly established.

William J. Stapleton, Jr., M.D., Emeritus Associate Dean of the Wayne State University School of Medicine, celebrated his 90th birthday with the help of nearly 300 well-wishers at a special subscription luncheon held at the Wayne County Medical Society headquarters in Detroit. Among those extending greetings were, from left: Ernest Gardner, M.D., Dean, WSU School of Medicine; Brock E. Bruch, M.D., President, Wayne County Medical Society, and Walter S. Wiggins, M.D., Director of Medical Education, American Medical Association, Chicago.

Beloved Dr. Stapleton Is 90 Years Young

BY PETER HOHEISEL
OF THE MSMS STAFF

"In my lifetime, more has happened in the history of medicine than in the previous 2000 years."

So stated William J. Stapleton, Jr., M.D., Detroit, MSMS historian, on his recent 90th birthday.

Doctor Stapleton has not only observed and written about his history, but he has also helped shape it. He still remembers the days when as a young physician he rode on his ambulance — a converted grocery wagon — down the cobblestone streets of Detroit.

HE HAS HELD a galaxy of important positions in the Michigan medical community. In 1925-26 he was president of the Wayne County Medical Society. During the years 1939-49 he was Dean at Wayne State University's School of Medicine. In 1953 he was elected by MSMS as the Foremost Family Physician in Michigan.

As a recorder of medical history, Doctor Stapleton is the author of *A Century of Service in Medicine,* the MSMS history that was published in 1965.

Doctor Stapleton not only continues to be a practicing physician at ninety years of age, but also is active on the Editorial Board of the *Detroit Medical News,* official publication of the Wayne County Medical Society. Each month he writes book reviews and summaries of literature which are of interest to the medical community.

WHEN ASKED ABOUT retiring, Doctor Stapleton replied, "Why should I go off and retire to some place like Florida. I have my roots here and I love my work. I have heard people say they can hardly wait to retire at 65. I can't understand it since I fully enjoy each working day.

Asked about how to advise young people considering medicine as a career, Doctor Stapleton said:

"He should realize that he must never stop studying. All his life the doctor has to keep learning about things. He can't be lazy about keeping up to date."

The Wayne County Medical Society sponsored the 90th birthday anniversary party for Doctor Stapleton.

Brock E. Brush, M.D., President of the Wayne County Medical Society, Bradley M. Harris, M.D., President-Elect of the Michigan State Medical Society, Edward J. Tallant, M.D., Associate Editor of the *Detroit Medical News,* and Don W. McLean, M.D., Chairman of the Wayne County Medical Society's Board of Trustees, made comments at the luncheon about Doctor Stapleton's contributions to medicine in Michigan.

Mediscene

Feb. 14 — Galens Honorary Medical Society Lectureship, AMA President Charles Hudson, M.D., University of Michigan, Ann Arbor

Feb. 16 — Spring Conference of the Woman's Auxiliary to the Michigan State Medical Society, Whittier Hotel, Detroit

Feb. 24-25 — Heart Days Forum, Michigan Heart Association, Sheraton-Cadillac Hotel, Detroit

(The Mediscene list in the January Michigan Medicine projects through 1967)

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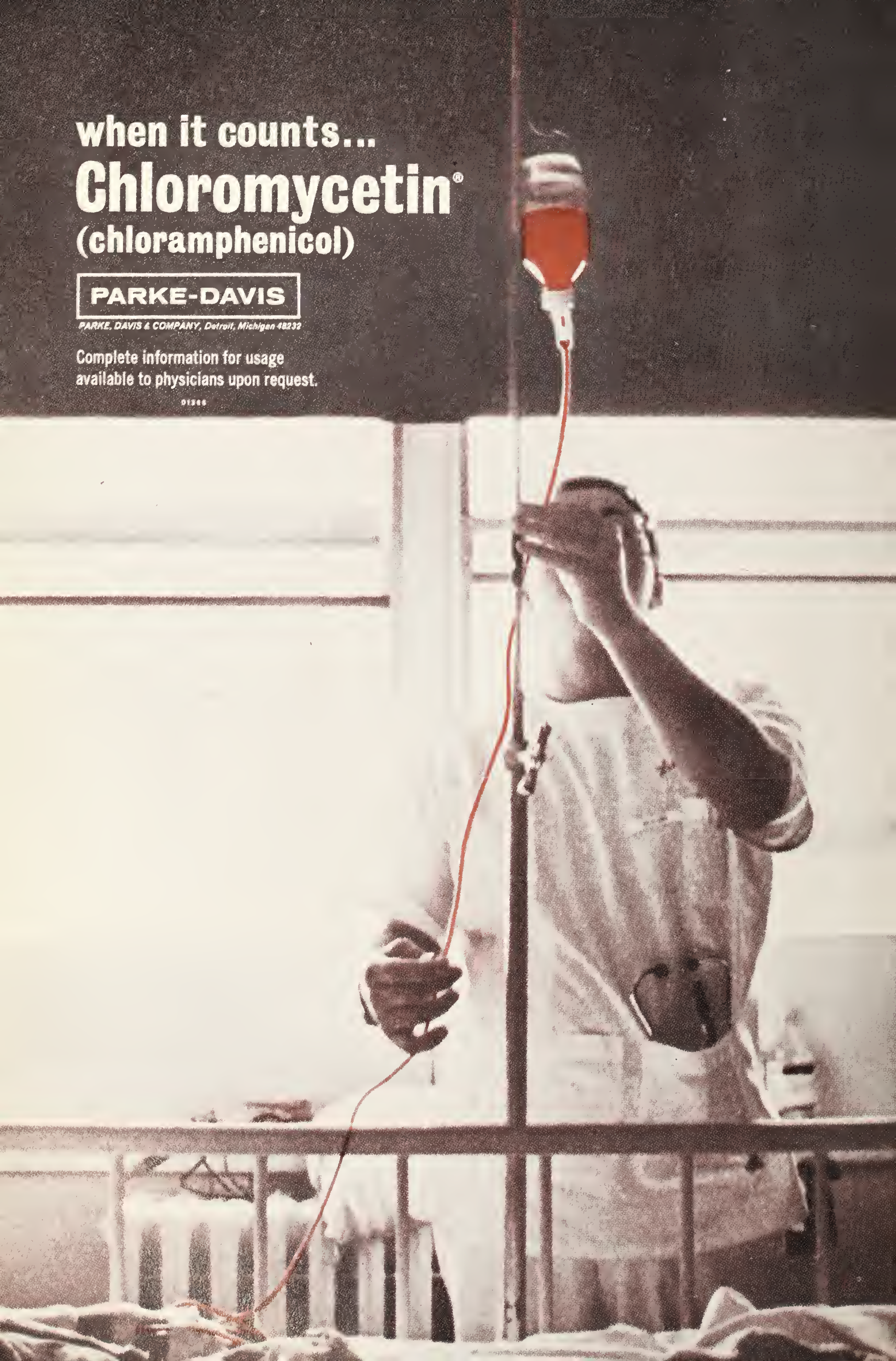

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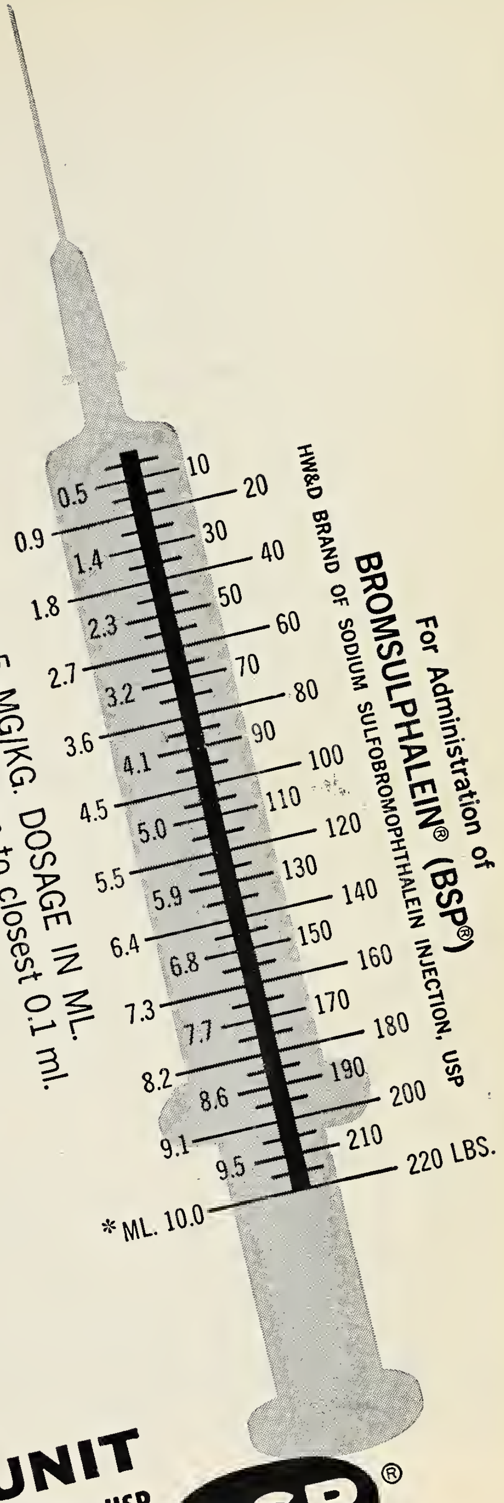
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MICHIGAN MEDICINE

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Volume 66, Number 3

The sculpture which appears on this month's cover is the focal point in the Office of the Dean, University of Michigan Medical School. Sculptured by William A. Kohl, it is approximately three feet high and is cast in bronze. Cover design by Roy M. Sano, Art Director, LesStrang Advertising, Inc., Ann Arbor.

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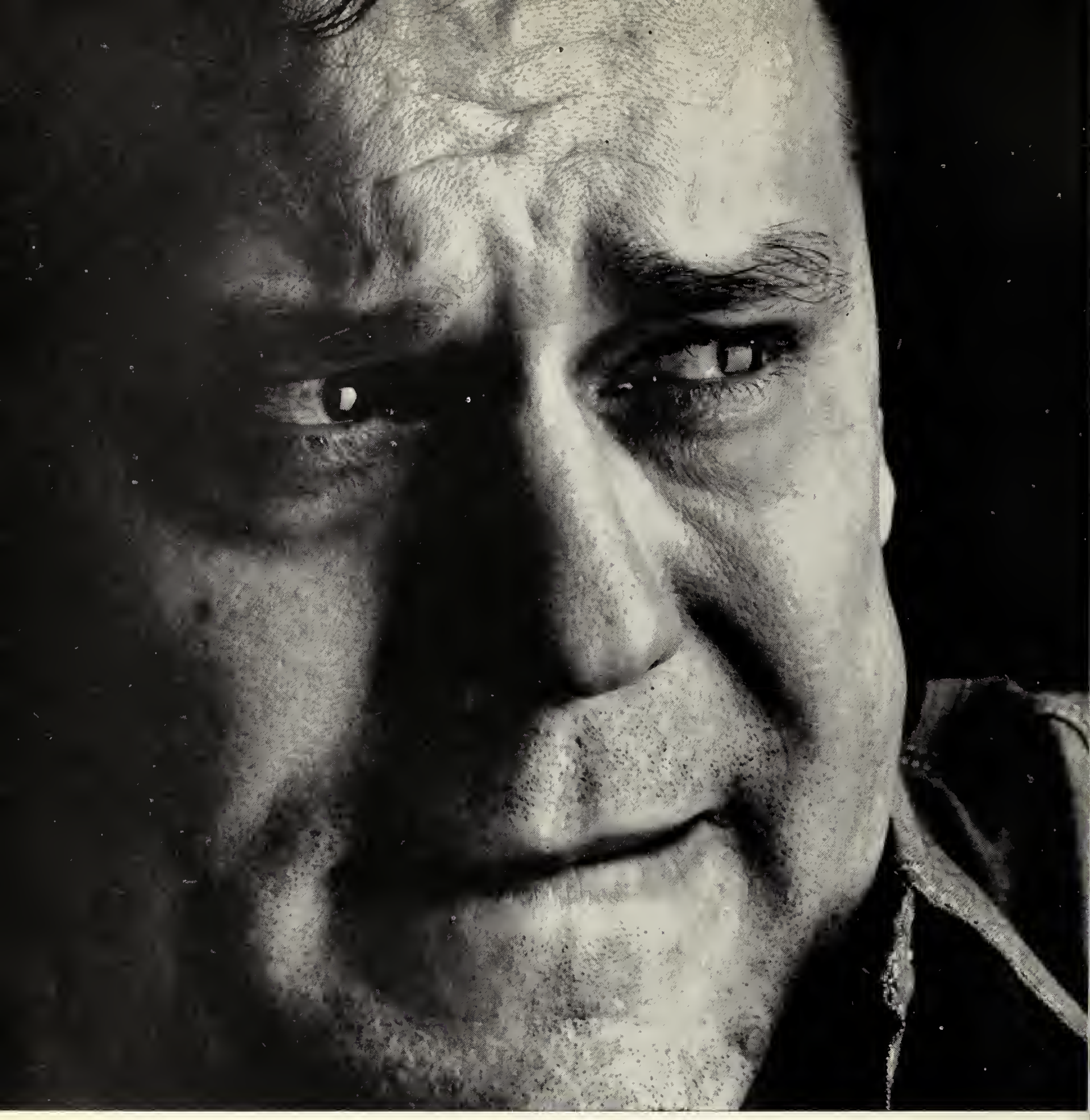

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president's message

We heartily agree with the recent statement of D. W. Roberts, Executive Director of the National Commission on Community Health Services:

> *All communities of this nation must take the action necessary to make available comprehensive personal health services of high quality to all people in each community.*

More recently, AMA President Charles L. Hudson, M.D., in his presentation before the clinical convention of the American Medical Association on November 28, 1966, endorsed and expanded on the ideas of Doctor Roberts.

One of the most effective methods of improving health care and of preventing further inroads on the private practice of medicine and stopping the rush toward federally-controlled medical practice is to provide a broad range of personal health services patterned according to the needs of each community so as to assure full and intelligent use by all groups in the community without regard to race, color, creed, economic or organizational status.

SUCH OBJECTIVES are best accomplished at the community, county or state level where specific needs peculiar to that area can be emphasized.

The accomplishment of such objectives will require the intelligent and sincere cooperation of all segments of the community with the local medical society and its member physicians supplying an appropriate amount of the necessary leadership.

The planning of a broad range of health services covering all phases of prevention and treatment of illness and disability also will require a citizenry that is sufficiently well informed and motivated to follow the established principles conducive to good health.

THE PHYSICIANS IN each community are most likely to know the unmet medical and health needs in their area. These may include planning of new or expanded hospital or related medical facilities, organization of immunization programs, cooperation in the health aspects of governmental programs, development of better blood banking facilities, the organization of clinics or voluntary health agencies, or a hundred other problems. It must be emphasized that the approach to the planning of health services must have a broad goal as is mentioned in Mr. Roberts' statement. Such planning does not dictate any particular form of organization but deals with the objectives which can be achieved with relatively modest modification of present patterns.

Initiation of and cooperation in the development of such planning and projects by physicians and county medical societies will demonstrate to the local citizenry that physicians are concerned citizens and are interested in improving community life. Such activity will also be a significant factor in improving the physician's image in the eyes of the public.

MSMS stands ready to assist in any way possible.

Only the physicians in their respective communities can supply the ideas, the initiative and the hands to make health care better for all people in their own communities.

C. Allen Payne MD

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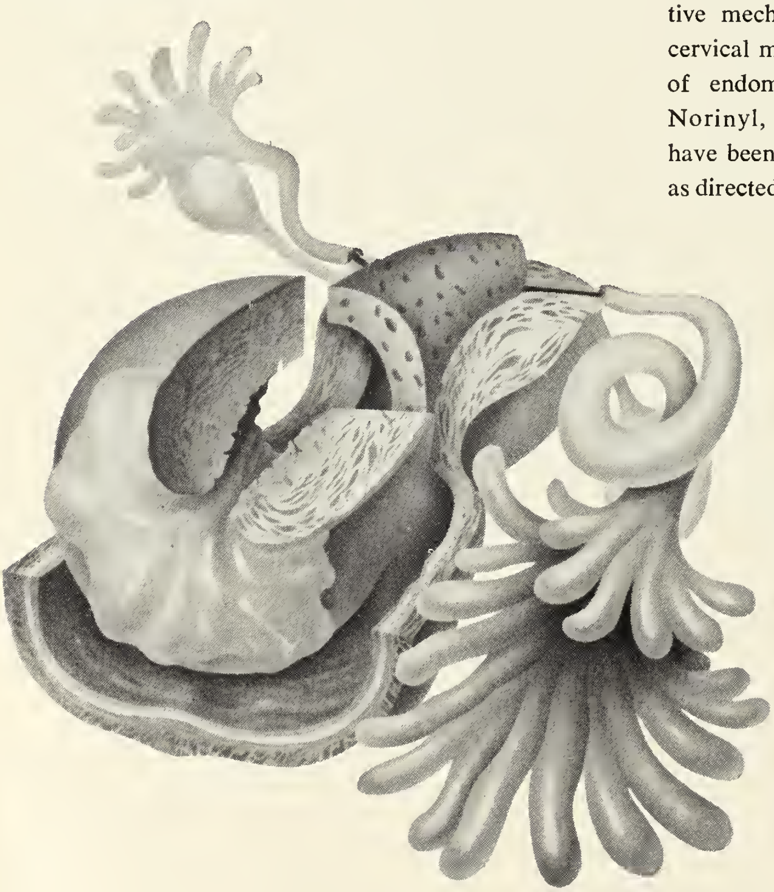

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Warning: Discontinue medication pending examination if there is sudden partial or complete loss of vision, or if there is a sudden onset of proptosis, diplopia or migraine. If examination reveals papilledema or retinal vascular lesions, medication should be withdrawn.

Precautions: By May 1963, experience with norethindrone 2 mg.—mestranol 0.1 mg. had extended over 24 months. Through miscalculation, omission or error in taking the recommended dosage of Norinyl, pregnancy may result. If regular menses fail to appear and treatment schedule has not been adhered to, or if patient misses two menstrual periods, possibility of pregnancy should be resolved before resuming Norinyl. If pregnancy is established, Norinyl should be discontinued during period of gestation since virilization of the female fetus has been reported with oral use of progestational agents or estrogen. When lactation is desired, withhold Norinyl until nursing needs are established. Existing uterine fibroids may increase in size. In metabolic or endocrine disorders, careful clinical preevaluation is indicated. A few patients without evidence of hyperthyroidism had elevated serum protein-bound iodine levels, which in the light of present knowledge, does not necessarily imply hyperthyroidism. Protein-bound iodine increased following estrogen administration. Bromsulphalein retention has occurred in up to 25% of patients without evidence of hepatic dysfunction. Studies from 24-hour urine collections have shown an increase in aldosterone and 17-ketosteroids and decrease in 17-hydroxycorticoid levels. Thus, Norinyl should be discontinued prior to and during thyroid, liver or adrenal function tests. Because progestational agents may cause fluid retention, conditions such as epilepsy, migraine and asthma require careful observation. Thus far no deleterious effect on pituitary, ovarian or adrenal function has been noted; however, long-range possible effect on these and other organs must await more prolonged observation. Norinyl should be used with caution in patients with bone, renal or any disease involving calcium or phosphorus metabolism.

Side Effects: Intermenstrual bleeding; amenorrhea; symptoms resembling early pregnancy, such as nausea, breast engorgement or enlargement, chloasma and minor degree of fluid retention (if these should occur and patient has not strictly adhered to medication plan, she should be tested for pregnancy); weight gain; subjective complaints such as headache, dizziness, nervousness, irritability; in a few patients libido was increased. In a total of 3,090 patients, 2.2% discontinued medication because of nausea.

NOTE: See sections on contraindications and precautions for possible side effects on other organ systems.

Dosage and Administration: One Norinyl tablet orally for 20 days, commencing on day 5 through and including day 24 of the menstrual cycle. (Day 1 is the first day of menstrual bleeding.)

Availability: Dispensers of 20 and 60 tablets; bottles of 100.

References: **1.** Council on Drugs. JAMA 187:664 (Feb. 29) 1964. **2.** Bryans, F. E.: Canad Med Ass J 92:287 (Feb. 6) 1965. **3.** Goldzieher, J. W.: Med Clin N Amer 48:529 (Mar.) 1964. **4.** Cohen, M. R.: Paper presented at Symposium on Low-Dosage Oral Contraception, Palo Alto, Calif., July 15, 1965. Reported in Med Sci 16:26 (Nov.) 1965. **5.** Hammond, D. O.: Ibid. **6.** Rice-Wray, E., Goldzieher, J. W., and Aranda-Rosell, A.: Fertil Steril 14:402 (Jul.-Aug.) 1963. **7.** Goldzieher, J. W., Moses, L. E., and Ellis, L. T.: JAMA 180:359 (May 5) 1962. **8.** Kempers, R. D.: GP 29:88 (Jan.) 1964. **9.** Tyler, E. T.: JAMA 187:562 (Feb. 22) 1964. **10.** Rudel, H. W., Martinez-Manautou, J., and Maqueo-Topete, M.: Fertil Steril 16:158 (Mar.-Apr.) 1965. **11.** Flowers, C. E., Jr.: N Carolina Med J 25:139 (Apr.) 1964. **12.** Goldzieher, J. W.: Appl Ther 6:503 (June) 1964. **13.** The Control of Fertility. Report adopted by the Committee on Human Reproduction of the American Medical Association. JAMA 194:462 (Oct. 25) 1965. **14.** Flowers, C. E., Jr.: JAMA 188:1115 (June 29) 1964. **15.** Merritt, R. I.: Appl Ther 6:427 (May) 1964. **16.** Newland, D. O.: Paper presented at Symposium on Low-Dosage Oral Contraception, Palo Alto, Calif., July 15, 1965. Reported in Med Sci 16:26 (Nov.) 1965.

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BY HARLAN HATCHER, PRESIDENT
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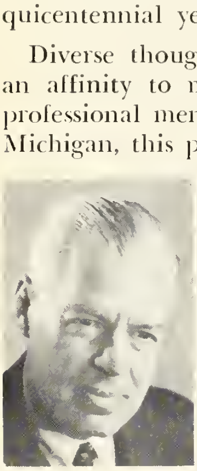
"Knowledge, Courage, and the Wisdom to Serve" is the theme for the University of Michigan Sesquicentennial year.



Diverse though these terms may be, they have an affinity to men in all walks of life. For the professional men of medicine at the University of Michigan, this phrase has been no less. They have studied with purpose; they serve with distinction. It is pleasant to recall that although the Sesquicentennial theme was not officially a part of the early curriculum, similar credentials were evident in the University's early history in medicine. One can particularly acknowledge the name of Victor C. Vaughn, who in the late 1800's assembled a scholarly faculty, initiating the highest standards for future M.D.'s. He demanded excellence.

SINCE THEN PROGRESS has not diminished, for the graduates of the Medical School or the state at large. An almost continuous postgraduate program for physicians is carried on, that new ideas, given birth through research, can be used immediately. What good is research without attention to mankind? Here the phrase "wisdom to serve" does have applicability. The idea, helping the physician in cities throughout the state, was a part of the University's early plan; it continues to be so.

The alumni of the Medical School have made an enviable record. They leave the University not in lockstep but as individuals, creatively seeking to play a role in medical education. Alumni and faculty have been, and are, leaders on all levels of teaching and research, adding to knowledge that man might benefit.

WITH A SENSE of pride, I add these notes to *Michigan Medicine*. The Medical School has been, and is, an indissoluble part of the University, always concerned with improvement for the state and nation.

In greeting you at this time, I acknowledge you may have attended different schools, but we sense your support, without which our Medical School would be the poorer.

Salute to U-M

BY GEORGE H. LOWREY, M.D.
SCIENTIFIC EDITOR

This issue of *Michigan Medicine* contributes the celebration of the University of Michiga Sesquicentennial. All of the scientific and hi torical articles have been contributed by membe of the faculty of the University of Michiga Medical Center.

Under the direction of Judge Augustus Woo ward and approved by the governor of Michiga Territory, the University of Michigan was create by law in 1817. It is interesting to note that tl first president and vice president were given sa aries of 25 and 19 dollars a year. Detroit was tl home of the new school until 1837 when it w moved to its present site in Ann Arbor.

Although the first state legislature in that ye provided for the teaching of medicine, it was n until 1850 that the doors to the Medical Scho were opened to the first class of ninety-one st dents (tuition of 10 dollars covered all costs). was the first professional school within the Ur versity and at the time had the largest enrollme of any college. No hospital instruction was i cluded and an academic year extended over on six months.

In 1869 the first hospital owned and operat by a university for purposes of medical educati was established. The first patient was admitted the present University Hospital in 1925. This fo lowed a frustrating five years during which a propriations were not available to complete equip this building. Since then there has bee steady growth of the medical complex to its pr ent size and outstanding reputation. More tha 10,000 men and women have graduated from tl Medical School to date.

Many famous teachers have taken part in t growth and development of the Medical Cent It would be impossible to list more than a fe and indicate their accomplishments. Victor Vaughn was instrumental in establishing the cli ical and experimental approach to medicine a attracted an outstanding faculty during his dea ship from 1891 to 1921. Frederick Novy was o of the pioneers in bacteriology and was head that department through the early years of tl

(Continued on Page 153)

DOCTOR,

Here is the expanded Abbott anorectic program designed to meet the individual needs of your overweight patients.

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METHAMPHETAMINE HYDROCHLORIDE IN LONG-RELEASE DOSE FORM

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Typically, the obese patient is a repeat dieter. And with each failure, the task looks more hopeless. Therefore, it is often just as important to lift the mood as to curb the appetite. Desoxyn Gradumet does just that. It gently elevates and sustains the mood. And no other product—amphetamine or non-amphetamine—is more effective in suppressing appetite.

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The Gradumet is made up of thousands of interconnecting channels, much like a sponge. These channels—filled with a drug—end at the outer surface of the tablet. When fluid comes in contact with the Gradumet, the drug in the outer ends of the channels dissolves. As the fluid makes its way up the channels, there is a continuous release of medication.

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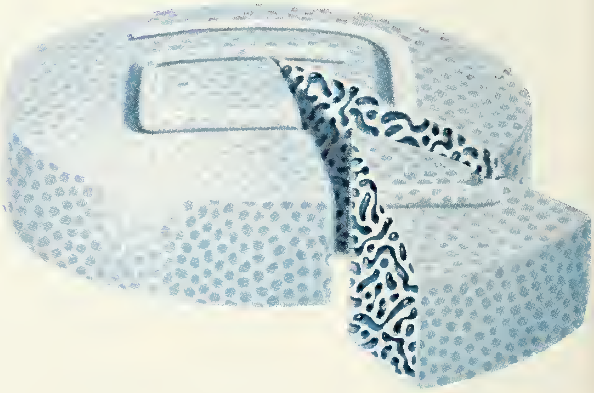


THIS IS A RELEASE YOU CAN COUNT ON

THE PROGRAM

WEIGHT CONTROL BOOKLET

the
secret
of
controlling
your weight

To help your obese patients understand why they are overweight—and what they can do about it—Abbott has a booklet called "The Secret of Controlling Your Weight." *It is available to your patients only through you.*

Here is a partial list of the topics covered:

Why you are overweight
Rewards of weight reducing
Balanced meals
Helpful hints
Hunger between meals
Snacks
Weekly weighings
Exercise
Holidays, vacations, special events
Leanness and longevity

Each topic is covered on one page in simple and easy-to-understand language. At the back of the booklet, there is a list of 160 foods showing their caloric content.

FOOD DIARY

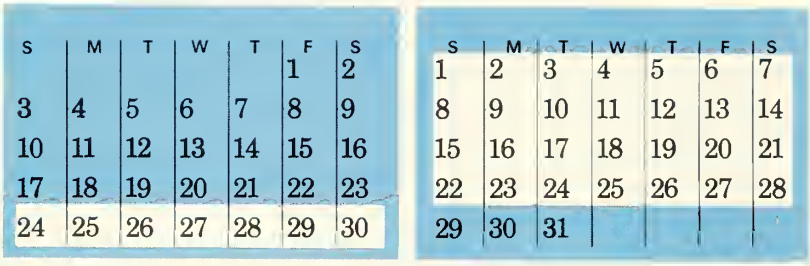
The Food Diary is designed to help the overweight patient follow your eating instructions. Space is provided for breakfast, lunch, supper, and even snacks. By writing everything down that's eaten each day, the patient is constantly reminded that she's trying to change her eating habits. And you are furnished with a written record of how well she's doing.

This booklet also lists the caloric content of 160 foods.

See Brief Summary on next page.

THE PRICE

ECONOMY



S	M	T	W	T	F	S
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3	4	5	6	7	8	9
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S	M	T	W	T	F	S
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29	30	31				

Desoxyn Gradumet and Desbutal Gradumet are so reasonably priced that patients in many cases save enough (compared to other leading long-release anoretics) to get five weeks of medication for the price of four.

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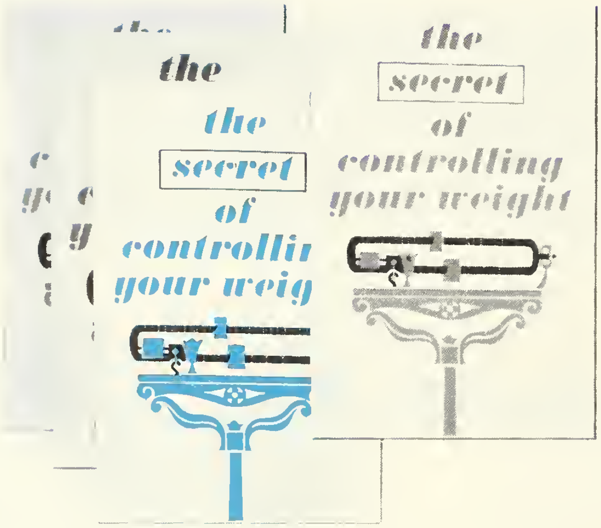

There are four weight control booklets, each with the same text, but with a different sample in the back of the booklet to meet your individual patient's needs. You have your choice of Desoxyn Gradumet in 10 mg. or 15 mg. strengths as well as Desbutal 10 Gradumet and Desbutal 15 Gradumet. The Food Diary is the same for all of the weight control booklets.

Your Abbott man will be happy to supply you with booklets. Just ask him.

CONTRAINDICATIONS: Methamphetamine (in Desoxyn and Desbutal) is contraindicated in patients taking a monoamine oxidase inhibitor. Do not use pentobarbital (in Desbutal) in persons hypersensitive to barbiturates.

PRECAUTIONS, SIDE EFFECTS: Observe caution in patients with hypertension, cardiovascular disease, hyperthyroidism, old age, or those sensitive to sympathomimetic drugs. Prolonged usage may lead to tolerance or psychic dependence. Careful supervision is necessary to avoid chronic intoxication and addiction.

Amphetamine side effects such as a headache, excitement, agitation, palpitation or cardiac arrhythmia usually may be controlled by reducing the dose. Paradoxically-induced depression is an indication to withdraw the drug. Pentobarbital (in Desbutal) may cause skin rash. Nervousness or excessive sedation with Desbutal is usually transient.

701069

Gradumet—Long-release dose form, Abbott: U.S. Pat. No. 2,987,445.

entury. For his magnificent contributions to the ield of electrocardiography, Frank N. Wilson won nternational fame.

Few men have contributed more in the training f physicians, in research or research which reulted from their stimulation than these leaders.

Others such as Cyrus Sturgis, Frederick Coller, Iax Peet, George Dock and Udo Wile were men vho have left an enviable heritage in the reputaion of their school and the men they trained to ollow them as leaders in medical education.

We salute the University of Michigan on its 50th birthday. With its Medical School it has stablished an enviable reputation for service, eduation and research devoted to the people of Michgan but spread far beyond our state borders in its enefits.

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BY RICHARD U. BYERRUM, Ph.D.
PRESIDENT, MICHIGAN HEALTH COUNCIL

"Teaming Up For Better Health" will be the theme of the Michigan Health Council's Silver Anniversary Year celebration which will start officially in July 1967.

The Michigan Health Council Board of Trustees unanimously approved plans to give prime emphasis to our Health Careers Program during our Silver Anniversary.

The Michigan State Medical Society, the Sears-Roebuck Foundation and Marlette Homes, Incorporated, already have shown their keen interest in "teaming up" with the Michigan Health Council through their generosity in providing and equipping our "Health Careers Mobile," the first of its kind in the nation.

More than 200,000 Michigan citizens viewed the "Healthmobile" during the Centennial Celebration of the Michigan State Medical Society. It visited 45 Michigan counties and was a featured attraction at many county fairs and won First Place for Medical Exhibits at the Michigan State Fair.

At the conclusion of the Centennial Year Celebration, The Council of the Michigan State Medical Society approved plans to turn the mobile unit over to the Michigan Health Council along with a $5,000 grant to assist in converting the trailer to a Health Careers Mobile.

Membership in the Michigan Health Council has increased from 4 organizations to more than 100 during our first quarter-century. It is our hope and desire that our present membership will continue voluntarily to provide adequate grants to maintain our present programs and projects. The trustees also strongly recommended that our present members "team up" with the Council during our Silver Anniversary in improving our health manpower situation by increasing their annual grants by at least twenty-five per cent. The Upjohn Company has helped our health manpower situation in Michigan tremendously through its continuing strong support of our Medical, Dental and Veterinary Medical Placement Programs.

The Michigan Health Council's varied activities to keep Michigan "The Health Capital of the World" deserve the heartiest endorsement by every MSMS member.

Speaking of Malpractice Insurance....

Have you checked the advantages of insuring with Shelby Mutual Insurance Company? This plan is sponsored by Michigan Association of the Professions and is available to members of the Michigan State Medical Society.

Here is why it might be beneficial for you to investigate

* Very Broad Coverage

* Competitive Premiums as Shown Below

Limits	Class 1	Class 2	Class 3	Class 4	Premises Minimum Premium
100/300,000	$97.00	$122.00	$234.00	$349.00	$27.00

(Premises Coverage Required with Professional Liability)

Class 1 — PHYSICIANS — No surgery.

Class 2 — PHYSICIANS — Minor surgery or assisting in major surgery on own patients.

Class 3 — SURGEONS — General practitioners who perform major surgery or assist in major surgery on other than own patients.

Class 4 — SURGEONS — Specialists.

Write for complete information as to coverage and premiums.

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MICHIGAN ASSOCIATION
OF THE PROFESSIONS
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mail bag

Have we of the medical profession attained such a degree of corrosion that we are about to abdicate our rights and ways of practicing medicine as we see fit?

Are we about to permit outside organizations, motivated by self-interest, to regiment us and those who will follow in our footsteps?

Dr. P. Bonnett, Past President of A.H.A. feels that the ultimate goal in medical care will not be attained until all physicians' salaries are paid from a "Broad Based Pool under private or government auspices." This spells financial control of our profession, it means that we become employees of hospital or government, and as such we lose power of self-determination. What these organizations have achieved or proposed to achieve comes from a "Unity of Purpose" tantamount to a collusion between hospital administrators, Blue Cross and allied organizations. Coercion is achieved through monolithic rules passed by these organizations, and if this fails, then financial strangulation will prevail through Blue Cross' power.

This "Unity of Purpose" is readily understood when one analyzes the composition of these various organizations. Membership in Blue Cross is overwhelmingly made of hospital administrators. The state hospital associations are composed entirely of hospital administrators. There is no better example in existence of "conflict of interest" than the one demonstrated by the over-lapping interest of these various organizations. I call, and have called attention to this conflict of interest concept because hospital administrators, Blue Cross people and other organizations have been so very prone to invoke this concept as a pet device, as a spurious argument to prevent physicians from exercising their due rights.

It is time for us of the medical profession to face facts, to realize that in hospital administrators, Blue Cross administrators, state hospital administrators, we have organizations with the avowed "Unity of Purpose" to govern the practice of medicine.

To this effect they will oppose us when their interest and ours conflict. To this effect they will seek government help to regulate us when there is conflict between their interest and ours.

Finally, it is with alarm that we should view the efforts of hospital administrators who attempt to extend the medical practice of hospitals by employing physicians in fields other than radiology and pathology.

The remedy is clear and simple, we physicians must devote more time to the administration of hospitals. We must seek and demand the appointment of medical men as trustees of hospitals. In this way we can participate in the deliberations of the boards of trustees and prevent decisions that would undermine the freedom of medical practice.

R. F. Archambault, M.D.
35550 Michigan Avenue
Wayne

The AMA is giving new emphasis in its continuing health education program to promote widespread immunization and to add another milestone in progress in communicable disease control.

While immunization against measles will be the central focus of this program, we must not relax our efforts against other diseases preventable by immunization. For not only do we have the means to eradicate measles in the foreseeable future, but also to eliminate the deaths from tetanus that occur each year. We have the means, too, to prevent the outbreaks of diphtheria and polio that crop up from time to time and to bring under better control the other communicable diseases for which we have effective vaccines.

Promotion of immunization has been a continuing part of AMA's health education program. It has been a positive program, also, for many state and local medical societies that has brought big dividends both in public service and public relations for the medical profession. These medical societies are to be congratulated on their constructive work in this area.

Now, however, it is obvious that new and intensified efforts are needed with respect to educating the public about immunization against measles as well as other diseases preventable by immunization. As in the past the medical profession, through its state and local societies, should play a leadership role in such programs.

To assist state and local medical societies in their efforts, AMA has available a number of educational materials in the form of pamphlets, posters, and envelope stuffers, at nominal quantity prices, as indicated in the attached catalog. As time goes on, other educational materials will be produced to assist in community programs.

Fred V. Hein, Ph.D., Director
AMA Department of Health Education

Mich. State Medical Society
Box 152
East Lansing, Mich.

Dear Sirs:

You are to be congratulated for selecting the months of Dec. and Jan. to be used for educational programs about alcoholism.

Will you please send me 10 copies of each of the items available. I will use them in my work.

Thanks.

Sincerely,

George W. Start
Minister
First Methodist Church
Cadillac

MICHIGAN AUTHORS

Henry Krystal, M.D., Detroit, "Withdrawal from Drugs," *Psychosomatics*, September-October, 1966.

Henry Krystal, M.D., Detroit, John M. Dorsey, M.D., Highland Park, and Robert A. Moore, M.D., Rockford, Illinois, "Alcoholism and the Force of Education," *Personnel and Guidance Journal,* October, 1966.

Rogelio Pardo, M.D., Ann Arbor, F. D. McDonald, M.D., and A. R. Myers, M.D., Boston, "Adrenal Hemorrhage During Anticoagulant Therapy," *Journal of the American Medical Association,* December 5, 1966.

Alfred H. Whittaker, M.D., Detroit, "Cut Hospital Bills by One-Fourth?" *Medical Economics* July 12, 1965.

TO LEAD DENTISTS

F. Darl Ostrander, D.D.S., Ann Arbor, a founding member of MAP and general chairman of the MAP Congress in Grand Rapids two years ago, is the new President-Elect of the American Dental Association.

Dr. Ostrander, in private practice in Ann Arbor, is also a professor on the faculty of the School of Dentistry at the University of Michigan.

ANNUAL CLINICAL CONFERENCE
CHICAGO MEDICAL SOCIETY

March 5, 6, 7, 8, 1967

Palmer House, Chicago

THIS CONFERENCE WILL BE OF INTEREST TO ALL PHYSICIANS
The program is presented by leaders of medical thought in all fields of medical activity. It is designed to interest the generalist and specialist alike. THE OUTSTANDING LECTURE PROGRAM IS PLANNED TO KEEP US ABREAST OF SCIENTIFIC DEVELOPMENTS IN MEDICINE. In addition certain sessions will take cognizance of happenings in the political and social arena which are molding changes in the practice of medicine. All physicians, regardless of their field of interest, will find this program to be informative and useful.

For program or registration information address:

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Each tablet contains: Codeine Phosphate gr. ½ (Warning—May be habit forming), Phenacetin gr. 2½, Aspirin gr. 3½, Caffeine gr. ½.

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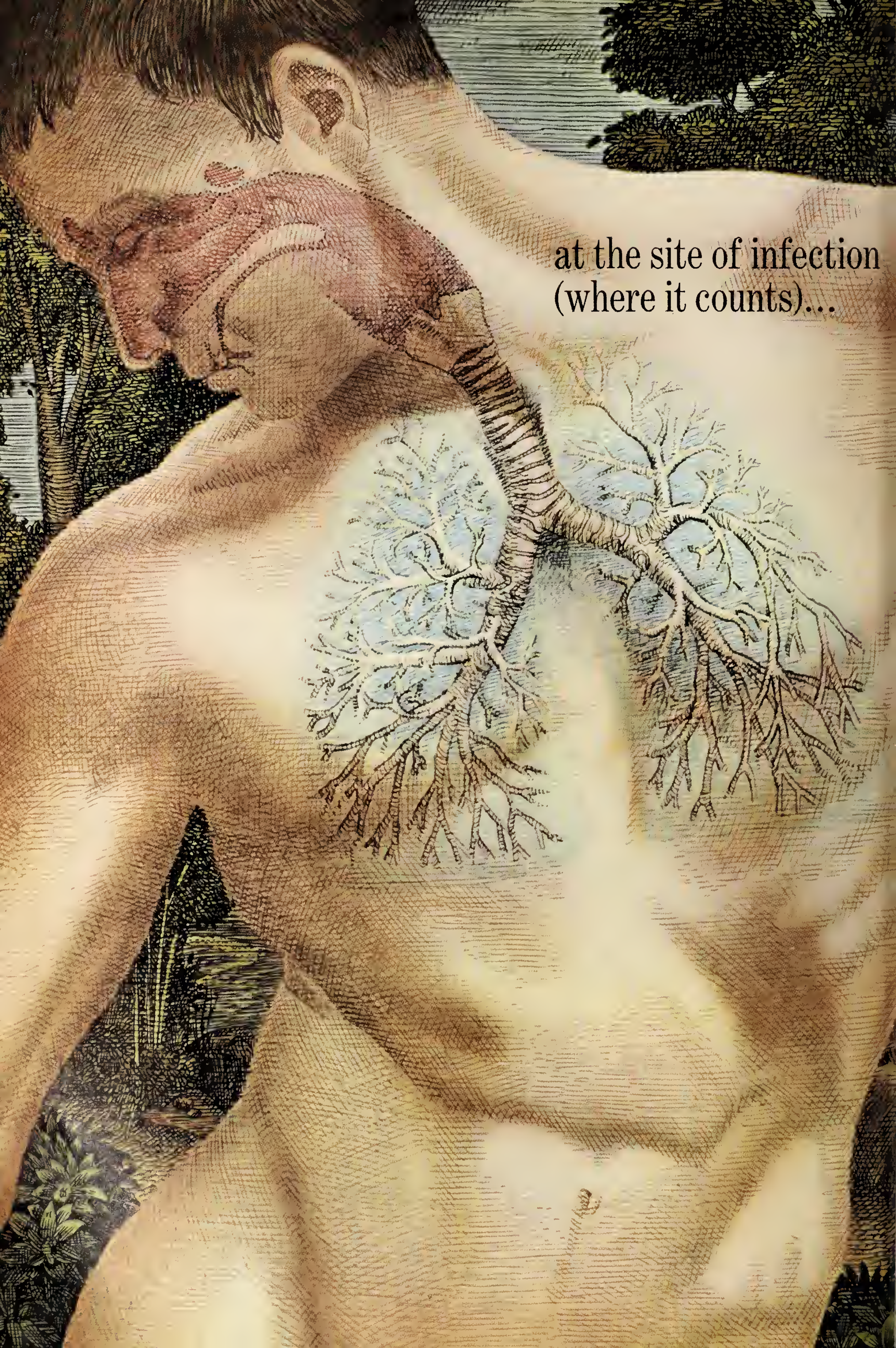
at the site of infection
(where it counts)...

Ilosone® provides more antibacterial activity than any other oral erythromycin

Acid stable, better absorbed . . . Ilosone produces faster, higher, more prolonged blood levels, even in the presence of food[1-3]

Because it is the most active form of oral erythromycin, Ilosone can help assure consistently greater antibacterial activity at the site of infection. Ilosone produces peak antibacterial blood levels two to four times those of other erythromycin preparations.[1,2] Not only are these levels attained earlier, but they are maintained for much longer periods. Even the presence of food does not seem to affect the activity of Ilosone.[1,3]

In the treatment of patients with bacterial infections susceptible to erythromycin, Ilosone has compiled an excellent therapeutic record. Since it exerts its greatest activity against gram-positive organisms, it is particularly useful in common respiratory and soft-tissue bacterial infections. Ilosone kills—not merely inhibits—streptococci, pneumococci, and more strains of staphylococci than any other macrolide antibiotic. This bactericidal action, coupled with the high antibacterial levels attained, makes Ilosone especially valuable in patients with low host resistance, such as infants, debilitated individuals, and diabetics.

Ilosone has shown no cross-resistance with penicillin and may be effective against organisms that have become resistant to that agent. Despite its high antibacterial activity, Ilosone has demonstrated a low incidence of side reactions. Blood dyscrasias, ototoxicity, and tooth staining have not been observed. Infrequent cases of drug idiosyncrasy, manifested by a cholestatic jaundice, have occurred, but there have been no known definite residual effects.

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Ilosone®
Erythromycin Estolate

Lilly

(See next page for prescribing information.)

Ilosone®/the most active oral form of erythromycin

Description: Ilosone is the most active form of oral erythromycin that has been developed. Because it is stable in acid, well absorbed, and excreted in lesser amounts in the bile, it provides faster, higher, and longer-lasting levels of antibacterial activity (ABA) in the serum, even when taken with food, than do comparable doses of erythromycin.

Indications: Ilosone is indicated in infections caused by microorganisms sensitive to its action (especially staphylococci, hemolytic streptococci, and pneumococci). The drug is therefore useful in a high proportion of bacterial diseases encountered in clinical practice and particularly in the treatment of bacterial infections of the upper and lower respiratory tract and soft tissues.

In the treatment of acute bacterial pharyngitis and tonsillitis, this antibiotic has promptly eradicated the bacteria (streptococci) and has produced a parallel prompt clinical improvement. There have been no group A beta-hemolytic streptococci resistant to this preparation. In beta-hemolytic streptococcus infections, treatment should be maintained for ten days to prevent the development of rheumatic fever or glomerulonephritis.

Erythromycin estolate has proved to be very effective in pneumococcus pneumonia and in acute bronchitis with pneumococci on culture. Bronchopneumonia and otitis media in children have responded well to its use.

The antibiotic has been used very successfully in staphylococcus infections. Good therapeutic results have been obtained in soft-tissue infections, abscesses, cellulitis, carbuncles, wound infections, and furunculosis.

In serious staphylococcus infections, erythromycin preparations should be used only in combination therapy with other antimicrobial agents. As is the case with any treatment regimen used in these severe conditions, surgical procedures should be performed when indicated, and large dosages of the antimicrobial agents should be employed. In this fashion, Ilosone has been effective in staphylococcus pneumonia, osteomyelitis, septicemia, empyema, and meningitis.

Multiple 500-mg. doses of the drug have been useful in gonorrhea and syphilis. Since penicillin is the drug of choice for the treatment of syphilis and gonorrhea, erythromycin estolate should be employed for these infections only in patients with a history of penicillin allergy. Also, other infections due to susceptible bacteria in patients known to be hypersensitive to penicillin or other antibiotics may be considered for treatment with Ilosone.

Contraindications: Ilosone is contraindicated in patients with a known history of sensitivity to this drug and in those with preexisting liver disease or dysfunction.

Side-Effects: Data obtained from seven years' use of propionyl erythromycin ester and erythromycin estolate (Ilosone) indicate that hepatic dysfunction with or without clinical jaundice may occur during or following courses of therapy with the drug.

Changes in liver function tests in such cases have been indicative of intrahepatic cholestasis. The symptoms appear to be the result of a form of sensitization. The initial symptoms have appeared in some cases after a few days of treatment but generally have followed one or two weeks of continuous therapy or several courses of the drug. Symptoms reappear promptly if the drug is readministered to sensitive patients, usually within forty-eight hours. Eosinophilia was noted in peripheral blood counts. The findings readily subsided without apparent residual effects when treatment was discontinued. Recovery was delayed in one reported instance. The physician indicated in this case that either drug-induced jaundice or viral hepatitis may have been responsible for the findings.

In one clinical study involving ninety-three patients treated with the antibiotic, three cases of jaundice were observed and an additional eleven cases developed some changes in liver function tests. Three of the patients had abnormal liver function tests a second time on readministration of the drug.

Even though it is assumed that not all cases of jaundice have been reported, it seems clear that the number is small compared with the amount of drug that has been used. Reported cases have included persons in whom there had been administered other drugs known to be associated at times with hepatic side-effects and cases in which the presence of viral hepatitis or other disease may have been responsible for the findings. In some of the cases, associated gastro-intestinal symptoms simulated the colic of biliary tract disease. In other instances, clinical symptoms and results of liver function tests resembled findings in extrahepatic obstructive jaundice. It appears that the occurrence of jaundice after administration of Ilosone is infrequent, but further investigations are being made to estimate its incidence more accurately.

In those cases mentioned above in which jaundice appeared to be definitely related to use of the drug, laboratory findings
characterized by increased direct-reacting bilirubin, ele
alkaline phosphatase levels, negative or weakly positive cep
flocculation and thymol turbidity tests, elevated serum glu
oxalacetic transaminase levels, peripheral eosinophilia, an
mal cholecystograms.

Individual idiosyncrasy seems evident since jaundice ha
been reported in other patients taking prolonged courses
medication. Patients with chronic infection have been give
to 2 Gm. of the drug daily for periods of two to six months
patients with rheumatic fever have taken prophylactic dos
0.5 Gm. daily for two years without difficulty. In one gro
144 patients who received the drug daily for two years, no
dice was noted. It was of interest that members of six of
patients' families, who were not taking the drug, had epi
of jaundice during the study period.

Transaminase and serum alkaline phosphatase levels
determined in a group of fifty-four adults and children wh
250 mg. of Ilosone daily for an average of sixteen mont
rheumatic fever prophylaxis. The results were compared
those of a similar group of forty-four patients who received
icillin. There were no cases of jaundice in either group. Elev
of SGPT and serum alkaline phosphatase levels during the c
of treatment was observed in one patient treated with Il
and in two patients treated with penicillin. Seven other pat
in the group receiving Ilosone and four others in the peni
group showed elevations in one of the tests at some time d
administration of the drugs.

Very satisfactory therapeutic results, without toxicity,
reported in 102 pediatric patients who received short-term
day) courses of Ilosone in the treatment of streptococcus i
tions. Results of liver function tests in these patients were
parable to those in a similar control group who had rec
penicillin.

Gastro-intestinal disturbances not associated with hepat
fects are observed in a small proportion of individuals as a r
of a local stimulating effect of the medication on the alime
tract; however, the normal intestinal gram-negative bact
flora is not appreciably altered by erythromycin drugs.

Although allergic manifestations are uncommon with th
of erythromycin, there have been occasional reports of urtic
skin eruptions, and, on rare occasions, anaphylaxis.

Administration and Dosage: Ilosone is administered orally.
Ilosone Pulvules®
Ilosone Chewable Tablets
Ilosone Drops
Ilosone, 125, for Oral Suspension

For infants and for children under twenty-five pounds of
weight, the usual dosage is 5 mg. per pound every six hours
children twenty-five to fifty pounds, 125 mg. every six h
(Tablets Ilosone Chewable should be chewed or crushed
swallowed with water.)

For adults and for children over fifty pounds, the usual d
of Ilosone is 250 mg. every six hours.

For severe infections, these dosages may be doubled.

When larger doses are indicated, parenteral erythro
therapy should be considered.

In the treatment of syphilis, the recommended total dosa
20 to 30 Gm. given in divided doses for a period of ten to fi
days. Close follow-up of the patient is necessary since ery
mycin drugs have not had adequate evaluation in all stag
syphilis. Examinations of spinal fluid are recommended as
of the follow-up therapy.

For gonorrhea, 500 mg. four times a day for four days
recommended. In the treatment of gonorrhea, patients wi
suspected lesion of syphilis should have a dark-field examina
before receiving antibiotics, and monthly serologic tests sh
be made for a period of three months.

How Supplied: Pulvules Ilosone, Capsules, N.F., 125 and 250
(equivalent to base), in bottles of 24 and 100.

Tablets Ilosone Chewable, N.F., 125 mg. (equivalent to b
in bottles of 50.

Ilosone Drops, 5 mg. (equivalent to base) per drop, in 10
size packages, with dropper calibrated at 25 and 50 mg.

Ilosone, 125, for Oral Suspension, N.F., 125 mg. (equiva
to base) per 5-cc. teaspoonful, in 60 and 150-cc.-size packa

References: 1. Griffith, R. S., and Black, H. R.: Am. J. M. Sc., *247*:69,
2. Griffith, R. S., and Black, H. R.: Antibiotics & Chemother., *12*:398,
3. Hirsch, H. A., Pryles, C. V., and Finland, M.: Am. J. M. Sc., *239*:198, 19

Additional information available to physicians upon request.
Eli Lilly and Company, Indianapolis, Indiana 46206.

new members

Richard D. Anslow, M.D., 1515 David Whitney Building, Detroit 48226.

Paul W. Babcock, M.D., 29584 Five Mile Road, Livonia.

Reuven Bar-Levav, M.D., 865 Fisher Building, Detroit, 48202.

Joaquin P. Bautista, M.D., 20503 Dequindre, Detroit, 48234.

John G. Bayless, M.D., (from Associate) 14411 East Jefferson Avenue, Detroit, 48215.

Melvin Bornstein, M.D., 17600 Northland Park Court, Southfield.

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The Sesquicentennial Of the University of Michigan's Role in Health

BY W. N. HUBBARD, JR., M.D.
ANN ARBOR

From its inception, The University of Michigan included a Faculty of Medicine as one of the thirteen original professorships of 1817 and one of the three basic departments of 1837.

It was seven years after the Department of Literature, Science, and the Arts began instruction in 1841 that the first two Professors were appointed to the Medical Department and instruction began the next Fall. Abram Sager, who was Professor of the Theory and Practice of Medicine, was also a Professor of Zoology and Botany. Silas Douglass, who was Professor of Materia Medica, was also Professor of Chemistry, Mineralogy and Geology.

The pattern of the Medical Department being an integral unit of the University was thus firmly fixed from the beginning and continues to the present. Today there are joint efforts in education and research between the Medical Faculty and every one of the other academic divisions of the University.

BUT LIKE ALL professional elements in a university, Medicine is designed to serve social needs. Like lawyers, teachers, architects and engineers, doctors must deal with the present realities of today's demands. The test of the validity of a physician's education is whether it prepares him to meet the health needs of the people in his community so that by his decisions and actions their well being is increased.

In the earliest years of The University of Michigan Medical Department, people from the community came for medical care to the Faculty and provided a semblance of clinical instruction for the students. In 1869 the Regents of the University provided $582.18 to renovate a building of twenty beds for this purpose, and so establish the first University Hospital in the United States. Working closely with the community, plans for a more adequate hospital evolved and in 1875 the people of Ann Arbor contributed $4,000 and the State Legislature $8,000 for a sixty bed hospital. In 1889 the citizens of Ann Arbor contributed $25,000 and the State Legislature $50,000 for an entirely new hospital on the site of the present Medical Center.

From these early days to the present, the Medical Faculty has worked in intimate cooperation with the local community and with the State at large.

The recognition that behavioral disorders are an inevitable part of the concerns of a medical

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Author

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faculty led, in 1888, to the establishment of a chair in Mental and Nervous Disorders and in 1901 to the construction of a State Psychopathic Hospital on the Catherine Street site.

This was the first instance in the United States of a cooperative venture between a State government and a University in teaching, research and care of patients with behavioral disorders.

BUT PATIENTS ARE part of their families and their communities. They do not belong to the hospital and their health is restored only when they are restored to their family and community roles. In 1892 these social elements of patient care were formalized in a group of citizens called the University Hospital Circle of the King's Daughters. In 1912 the Nursing Department made social work a formal portion of the nurse's responsibility to her patients and in 1918 a Supervisor of Social Service was appointed for the first time in the University Hospital.

In that same year the Hospital School was established so that the hospitalized child could continue his education. In 1920, occupational therapy was formally established. All of these efforts are concerned with the individual patient and with his reinstatement as an effective member of society. They mark the early fulfillment of the need of the physician to work with and through social and community agents in serving the total health needs of his patients.

Francis Bacon wrote, "Ask of the ancient times what is best and of the present time what is fittest." Medical schools in classical times were not a part of the academies. The period of the Renaissance saw the beginning of the modern university where Philosophy, History and Logic were taught in the same institution as the professions of Medicine, Law and Theology. The American university is striving today to participate even more directly in the affairs of the community while still preserving the values of scholarly inquiry and education free of political and marketplace influences. Medicine has been in the forefront of this evolution of the university toward a more intimate community involvement, with each faculty having its own balance of efforts and its own areas of emphasis. This variety is characteristic of American universities and one of the great strengths of American medical education since it allows the innovation and variation that is necessary for progress.

Our present knowledge and skills are inadequate to prevent or cure the current major causes of premature death, so that no change in the volume, emphasis or organization of services based on this level of understanding can substitute for the research which alone will provide the knowledge requisite for more effective service. The nature of the health problems of America has changed radically in the last twenty years and the lack of availability of optimum service to all our citizens has become a national concern. Such changes in community needs demand responses from the university that will assure the relevance of health related education and research to the practitioner roles of the physician and the other health professionals.

One-hundred-fifty years ago the programs of a medical school might still represent the total effort of a university toward the improvement of human health, but today the effort demands the attention of many faculties. Since 1945, the Division of the Health Sciences of The University of Michigan has coordinated the allied interests and activities of the Medical School, the School of Public Health, the School of Dentistry, the School of Nursing, the College of Pharmacy, the University Hospital and the University Health Service.

But this is only the beginning. Speech therapy, medical and psychiatric social work, hospital administration, clinical psychology, occupational therapy, medical technology, bio-engineering, physical therapy and many other specific health related occupations have their educational base outside the Division of the Health Sciences but utilize the resources within it. Well over eighty formal educational programs leading to particular health related roles in the community now are offered by The University of Michigan.

In the sciences basic to Medicine and to health, The University of Michigan's graduate programs in the social sciences, physical sciences, biological sciences—as well as engineering and the humanities—all have formal ties to the faculties of the schools of the health professions through joint appointments in the Rackham School of Graduate Studies. In a recent national study of the quality of graduate educational programs, these departments all were ranked in the two highest categories—a relative position second only to Berkeley among the state universities.

The research grants to the Medical School Faculty place it among the leaders of the nation, while it graduates more physicians each year than any other medical school. It is probably fair to assert that quality has not been sacrificed as opportunities to study medicine have been increased to meet the needs of the community.

THE PROGRAMS OF The University of Michigan are deeply involved with the hospitals and practitioners of the State. Since 1892, postgraduate instruction has been offered in Ann Arbor and over 2,500 physicians annually attend these courses. In the early 1920's, extramural postgraduate conferences extended to all regions of the State.

In 1927, a Department of Postgraduate Medicine was established and a cooperative effort with the Michigan State Medical Society and the Detroit College of Medicine and Surgery (the forerunner of Wayne State University Medical School) began which continues to the present. Today, 19 community hospitals have affiliated programs with The University of Michigan—the largest such program in the United States.

The basic instruction of medical students within recent years has included assignments to community hospitals, a county hospital and a Veterans Administration hospital as well as the University Hospital. In the six months of elective time in the senior year, medical students work in carefully planned and supervised programs that carry them all over the world. For those interested in family practice, a special program is available in cooperation with a community hospital which makes the senior year elective continuous with an internship and residency leading to family practice.

The Bureau of Hospital Administration has worked with many communities throughout the State in planning hospital development in response to community-wide and regional needs. The School of Public Health has been a leader in studies to define the resources of a community, its needs and the local leadership which ensures that its health needs are met. The Department of Psychiatry has an important segment of its advanced training programs based in schools, clinics and community agencies throughout the State. The inventory of such community involvement includes most of the eighty-odd programs of health related education referred to previously.

The Medical School, then, is part and parcel of the University; but the total health directed effort of the University extends far beyond the Faculty of Medicine. The modern University began with the incorporation of the "learned professions" which met a community need and today medicine is in the forefront of ever more direct responsiveness to these social needs.

Yet, there still remains the inalienable responsibility of the Faculty of Medicine to set the standards for the M.D. degree.

IN THE FIRST PLACE there are decisions and actions concerned with diagnosis and therapy of disease for which society holds the physician personally responsible for the individual patient's welfare. By ancient precedent and modern practice and law these responsibilities have been remarkably stable, while the nature of the diseases and the mode of dealing with them have radically changed. The theoretical background and practical experience that is necessary for early, accurate diagnosis and rational, effective therapy constitute the central core of the Medical School curriculum.

Preventive medicine, rehabilitative medicine and medical practices for health maintenance bring the physician into an arena where he shares responsibility for decision and action with other health workers and community agencies to a greater extent than in his diagnostic and therapeutic efforts. The ancient paradox of human values residing in the group while finding sole expression in the individual now confronts the physician. Social and behavioral pathology have etiologies and therapies that include but extend far beyond the knowledge and skill that justify the professional responsibility of the physician. He therefore is an inevitable part of but not solely responsible for the individual whose well being is impaired by social and behavioral pathology. Whatever his evolving role may be in this realm, it will not substitute for or diminish his responsibility for dealing with organic disease.

Today's curriculum, already overloaded, must provide knowledge and experience which will allow the future physician to fulfill his shared responsibility for social and behavioral pathology. It must provide a deeper understanding of research in the biological and physical sciences so that the relevance of these abstract fields to human health can be appreciated and incorporated into his practice as new knowledge develops. The curriculum must not coerce in any way a premature commitment of the student to one or another of the special interests of the faculty or administration; rather it must be flexible enough to respond to the individual interests and aptitudes of the students.

The curriculum must not be fixed but must be recognized as only a means of bringing together a faculty characterized by great variety with students of widely assorted backgrounds to consider in an environment of scholarly inquiry a set of problems that have change as their only constant feature. Such a curriculum is a reflection of the need to adapt rapidly evolving scientific knowledge to the

Remember?

This photograph, taken about 1865, shows the original U-M Medical School begun in 1850. This building was used for pharmacology when the newer West Medical Building was completed at the beginning of the present century.

The first university owned and operated hospital is the building on the left, acquired by the Medical School in 1869. The pavilion on the right was completed in 1876 and was the first structure specifically designed as a hospital for the faculty.

The "pest house." The contagious disease hospital finished in 1913 was demolished in 1950 for new construction. Rumor said that it was built of wood so that it could readily be burned if an epidemic disease got out of hand.

The old entrance to the present University Hospital. This photograph was taken shortly after completion of the building in 1925. Three more floors have been added since.

equally changeable health needs of mankind. It is not a simple task.

THE TOTAL SYSTEM of efforts necessary to secure optimally the health of the people rests upon knowledge given human purpose. The University is a part of this total system and its programs of research and education in health secure the foundations of professional competence. But the University is only a part of the system since community needs define the nature of professional obligations and so establish the relevance of the University's efforts.

This partnership now has extended to the Sesquicentennial Celebration of The University of Michigan.

Like most marriages, the equilibrium is dynamic and each of the partners looks upon the other with mixed affection and anxiety. Each recognizes and respects the simultaneously independent and interdependent contributions that each make to the fruit of the union. While reviewing with some satisfaction the achievements of the past century and a half, we recognize the need for renewed effort in confronting the problems of the coming years. □

Old West Medical Building was the second one constructed for student teaching on the Ann Arbor campus. It was used for basic science classes until 10 years ago.

List Major U-M '67 Medical Events

The following chronologic list of programs concerns the University of Michigan Medical School programs which are planned specifically for or in conjunction with the Sesquicentennial Year. These programs are in addition to the continuous programming which is carried out each year by the various departments within the Medical School and the Department of Postgraduate Medicine.

MARCH 20-24 — Conference on Gastroenterology sponsored by the American College of Physicians

APRIL 19-21 — University of Michigan Medical Center Sesquicentennial Symposium on the Prevention of Highway Injury

MAY 18 — Conference — Michigan Chapter of the American College of Surgeons

SEPTEMBER 14-16 — Annual Meeting of the American Thyroid Association

SEPTEMBER 29 - OCTOBER 1 — Conference — American Academy of Child Psychiatry

OCTOBER 5-7 — Medical School Alumni Reunion

OCTOBER 9-13 — International Conference on Leukemia and Lymphoma

OCTOBER 27-28 — Regional Meeting, American College of Physicians

NOVEMBER 15-17 — International Conference on "Fertility and Family Planning — A World View"

NOVEMBER 26-29 — Conference — "Genetics in Medicine," Sponsored by the American College of Physicians

SPECIAL ARTICLE

A Medical School At the University of Michigan? A View After 150 Years

BY JOHN R. G. GOSLING, M.D.
ANN ARBOR

The 1817 date being celebrated by the University of Michigan does not at first glance have much of immediate medical importance about it.

Practically everyone remembers that the real beginning was the first lecture given to the first medical class on the first Wednesday in October, 1850. The $10 fee for 6 months of such instruction was not unreasonable and those first students marked their experience with little comment.

YET THE 1817 date that we celebrate does have significance. The Territorial Act in that year establishing the University of Michigan specifically recommends 13 professorships including one in Medical Sciences. By some kind act of providence, that one-man medical school did not become a reality.

Michigan statehood in 1837 produced a legislature and the legislature, in turn, produced a legislative act which established a University of Michigan with three departments: Literature, Science and the Arts; Law; and Medicine; purportedly for the welfare of the citizens of said State. The improving influences of "Literature, Science and the Arts" were a relatively immediate reality but the medical beginnings were deferred for the time being.

Enter Zina Pitcher, M.D., an Army surgeon who, lacking an Alexis St. Martin, contributed to Michigan medicine in another way. Born in 1797, he was graduated from Vermont College in 1812 and served as a military surgeon until 1836, then left the Army and began private practice in Detroit. An accomplished naturalist, his interest in education brought him a place on the first University of Michigan Board of Regents in 1837.

Ultimately, almost a decade later, he emerged as the chairman of a committee to consider the establishment of a medical school at the University of Michigan. To no one's surprise, the report he presented in 1849 was favorable and the project was at long last under way.

NO ONE COULD maintain that the beginnings were particularly revolutionary. The faculty had a conventional ring to it.

Abram Sager, M.D., Professor of Obstetrics and Diseases of Women and almost parenthetically, "President of Faculty," which translates literally to "Dean" in today's usages. For whatever significance it may have, this learned gentleman had been Professor of Botany at the University for the previous eight years.

Moses Gunn, M.D., Professor of Anatomy and Surgery who, as an enterprising young man, had already performed the first recorded dissection of a cadaver in Ann Arbor. He sold general admission tickets to the event.

Samuel Denton, M.D., Professor of the Theory and Practice of Medicine; J. A. Allen, M.D., Professor of Physiology and Pathology and Silas H. Douglas, Professor of Chemistry, have taught the subject at the University for the previous 5 years.

The setting was not really revolutionary. Of the 37 reasonably bona fide medical schools founded in the United States in the previous 85 years, 23 had at least a semblance of real affiliation with some institution of higher learning. Pennsylvania,

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Columbia, Harvard, Dartmouth, Yale, Maryland, the University of the City of New York, and the University of Virginia, to name but a few, would not be considered bad sites for the educational process even in today's enlightened judgment. It certainly cannot claim any particular distinction on the frontier because Transylvania had been functioning for more than 30 years; there were already at least 5 medical colleges in Ohio, and Rush in Chicago as well as Missouri Medical College in St. Louis were clearly further to the west.

However, in two respects, Michigan stood out! The matriculation fee was $10, even at that time a very low figure. Further, not only anatomy but also chemistry was taught in the laboratory rather than the lecture hall; a revolutionary development at the time.

If not particularly innovative, the setting was certainly bucolic enough. The first medical building, built at a cost of $9,991.84, was a 3-story structure facing eastward from the campus over a vista of grazing cattle and flourishing corn. The amphitheatre had seats for 222 students and provided the locale for a 6-month series of lectures which lasted 2 hours or more in the morning and at least 2 hours in the afternoon.

One might conjecture that the seats were on the uncomfortable side, or else the class tended to somnolence, in that a second tour through the identical series of lectures was required during the second year. This tended to simplify the planning of curriculum.

TO ACTUALLY BE admitted to the M.D. degree, the candidate had to produce evidence of having pursued the study of Medicine and Surgery with a reputable practitioner for a term of 3 years. Mercifully, "reputable practitioner" is not further defined. During this time he must have attended two full courses of lectures, at least one of which was at the University of Michigan, and submit an original thesis. Finally he had to pass an examination at the end of his course of study.

The address by Doctor Pitcher to the first graduating class is extant and reminds the class of the benefits which their state had conferred upon them. He proceeds to summarize a body of natural history, purportedly taught them, including geology and paleontology, and likely to bring a present-day group of medical students to the verge of hysteria. He then charges his listeners with their responsibilities for continuing scholarship, concern for the public health and welfare, and the maintenance of the highest traditions of medicine, and without question, he does a thorough job of it.

The stern experience was tempered somewhat by one of the first of a long line of splendid teachers. Corydon LaFord came to Michigan in 1854, having previously taught anatomy in upstate New York. This dedicated teacher made anatomy a fascinating subject for 40 years of University history, and while he did not practice actively during most of his days in Ann Arbor, he did assume Dr. Gunn's surgical responsibilities while that worthy gentleman was off fighting in the Civil War.

Dr. Gunn was an equally colorful character. In 1853 he moved to Detroit in the interests of building his practice and thereafter commuted to Ann Arbor twice a week to give his lectures in Surgery. He was a strong voice in favor of moving the school to Detroit in view of the local deficiency of clinical material, and ultimately resigned, after a culminating battle, to move on to Rush Medical College in Chicago. The entire stock of cadavers in the Anatomy Department disappeared at the same time, but Dr. Gunn was never called to account in view of the possible embarrassment connected with any inquiry into the sources of dissection material.

ONE WONDERS THAT there was not more difficulty than there was over this subject. Reuben Peterson, M.D., tells the story of a disgruntled patient who came to seek a physician in a nearby town. After a long interval his loud and persistent knocks were answered by the doctor's wife dressed heavily in black. When told that he could not see

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the doctor, he declared his intention to wait. The wife replied, "Haven't you heard, Doctor passed away and was buried last week." The patient was considerably annoyed. "Wal, I've heard doc's excuses before but this one beats 'em all. Why just an hour ago I saw him all dressed up, sitting between two men, driving lickety split toward Ann Arbor."

This violation of the resurrectionists' injunction, "don't raise 'em too close to home," was ultimately punished, but there are many others which were not. How many mourners prayed for the resurrection of a loved one, little knowing it had already taken place, can only be guessed, but it was not until the passage of Anatomy Laws at the turn of the century that the practice really ceased.

THE SCHOOL GREW in many ways. An addition to the original medical building was made in 1864, with the assistance of a local subscription of $10,000. This was timely because the returning veterans of the Civil War were anxious for an education, and by 1866 the enrollment was 525 students, reportedly the largest in the country at that time. The recurrent problem of clinical experience persisted. In the early years patients were brought by their doctors to the professors, who then asked them to agree to appear before the class. Clinical demonstration was carried out in the amphitheatre and the patients were quartered in boarding houses about the town. Operations were performed in the anatomical lecture room and the postoperative patient carried back to his boarding house on a stretcher by volunteer medical students.

WILSON

COLLER

VAUGHN

NOVY

Frank Wilson, M.D. (1890-1952), an outstanding cardiologist, was one of the primary developers of the electrocardiograph.

Frederick Coller, M.D. (1887-1964), for many years Professor of Surgery, built his department into leading training ground for surgeons throughout the world.

Dean Victor Vaughn, M.D. (1851-1929), was influential in building a strong faculty at the turn of the century.

Frederick Novy, M.D. (1864-1957), was Professor of Bacteriology and briefly Acting Dean of the Medical School. He had studied with Koch and Pasteur.

In 1868 a remodeled professor's residence on the northern edge of the campus provided more centralized accommodation for patients but it was not until 1876 that a pavilion hospital was built in this location, with 150 beds and no operating theatre. The first University Hospital in the United States!

In 1875 a side issue was finally brought to a roaring climax. The appropriations bill that year carried a rider depriving the University of its funds unless it stopped stalling and established a department of homeopathy. Appropriate professorships were established and the homeopathic program was vigorously maintained for some years.

The arrangement continued until 1922 when the Regents finally abolished the program. It is memorialized, after a fashion, by the homeopathic building still on the edge of the campus and now adorned with a singularly nonhomeopathic-looking five-inch naval gun. No one can deny that the homeopaths had a very effective influence in the legislative proceedings of the period and made good use of it. Fashions may change in forms of medical practice, but there seem some relatively consistent characteristics in other human institutions and usages.

In the last 15 years of the 19th century Michigan's Medical School had a major influence upon American medical education. In its direct form this is represented by the lengthening of instruction from six to nine months, the adoption of entrance examinations and premedical requirements, the initiation of three years of graded sequential instruction and the substitution of laboratory experience for lecture courses. The leader in this period is Victor Vaughn, M.D., inelegantly nicknamed "Piggy", but a man combining broad vision and the capacity for leadership.

This is the period of Dock, Lombard, McMurrick, Cushny, Novy, Huber, Warthin, Parker, Canfield, Peterson and many, many others. Dr. Novy is an example. A chemistry student from Chicago, vith a lifelong curiosity about science, he became i close colleague of Dr. Vaughn's and in 1888 vent to Koch's Hygeinic Institute of Berlin, reurning to teach the first American laboratory ourse in Microbiology for three months beginning in January of 1889.

The scope of his career might be represented by a list of honors that would be nothing short of incredible even in this day and age, or by a publications list approximating 200 titles, but is probably best represented in several generations of his students who are better men for having known him. The author of this piece remembers him fondly as a retired professor remarking after dinner about the school to which he devoted almost 60 years of his life.

OF AT LEAST equal importance is the influence upon American medicine of the men who go forth from Michigan to other challenges. A case in point is Johns Hopkins. The influence of the great innovations and high standards set by that institution is still with us today. There were eight names on that first faculty and, because of the great stature of Welch and the tremendous clinical influence of Osler, Halstead and Kelly, one forgets that Henry M. Hurd, M.D., the first superintendent of the Hopkins Hospital, was a graduate of Michigan; that John J. Abel, Professor of Pharmacology, earned his degree at Michigan and later occupied the Chair of Materia Medica here; that Franklin P. Mall, first professor of Anatomy, earned his M.D. at Michigan in 1883, before working in Germany; and that William H. Howell was Associate Professor of Physiology at Ann Arbor before moving to the East. Just one example, but a useful one!

The final stage, still in many respects underway, has been the development of the Medical Center in the present scope. The opening of the present University Hospital in 1925 was an epic and complex struggle which foretold what was to come. In this setting the familiar great names became a part of the tradition of the fine clinical medicine. Frank Wilson, Sturgis, Newburgh, Van Zwaluwenberg, Hickey, Cowie, Camp, Wile, Peet, Alexander, and Coller to name just a few. This phase, begun under Cabot and carried forward under A. C. Furstenberg could scarcely be given just treatment in a sizeable book, let alone a brief chronology such as this.

NOW THE CONTINUING development of clinical facilities is being supplemented by the development of research and basic science space of proportionate potential, and the traditions of broad and balanced excellence that the University has proclaimed from its inception seem better served.

As the Flexner report demonstrated 50 years ago, the best climate for excellence in a medical school is within the broader structure of a great university.

We have been fortunate in this.

The traditions of the University are most immediately and intimately brought to the medical profession of the state of Michigan by its medical school. As with any complex relationship, there are always aspects of the affairs of the school and the profession which could be improved.

The fact that the University, its Medical School, and the Medical profession of the state share a common objective — excellence — is a sufficient reason to justify looking ahead with optimism and enthusiasm. ☐

BIBLIOGRAPHY

1. Chesney, Alan M. The Johns Hopkins Hospital and the John Hopkins School of Medicine. Vol. 1, Johns Hopkins Press, Baltimore, 1943.
2. Huelke, Donald F. A History of the Department of Anatomy. Part I. Univ. of Mich. Med. Bulletin. Vol. 27, Jan.-Feb., 1961. pp. 1-27.
3. Miller, Norman F., Reuben Peterson, Protagonist of Modern Obstetrics and Gynecology. Univ. of Mich. Med. Bulletin. Vol. 27, Mar.-Apr., 1961. pp. 60-68.
4. Peterson, Reuben. Landmarks in the Medical School. Michigan Alumnus Quarterly Review. Vol. 45, No. 19, April, 1939.
5. Pitcher, Zina. An Address to the First Graduates of the Medical Department of the University of Michigan, April, 1951. Univ. of Mich. Med. Bulletin. Vol. 23, June 1957, pp. 185-196.
6. Vaughn, V. C. A Doctor's Memories. Bobbs-Merrill Co. Indianapolis, 1926.

Infantile Prostatism

BY REED M. NESBIT, M.D.
MARIO M. LABARDINI, M.D.
BOTH OF ANN ARBOR

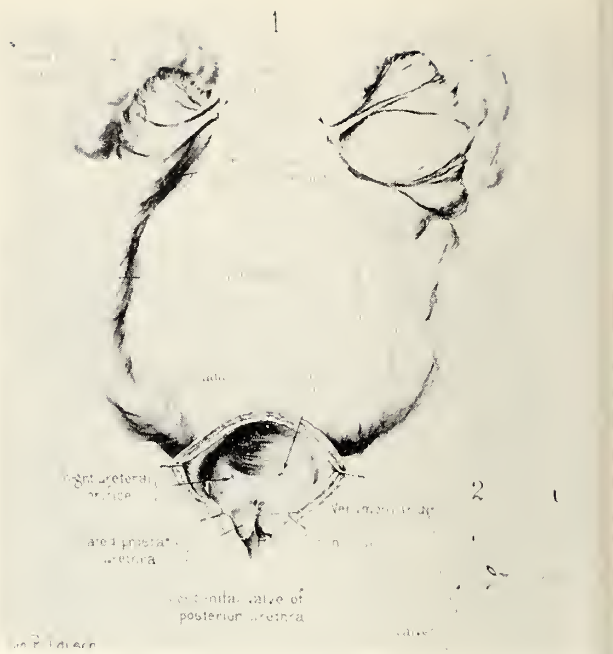

Fig. 1: Drawing of the anatomical relations of congenital valves in the prostatic urethra and the complications that may occur.

Abstract: Infantile prostatism, due to congenital valves in the prostatic urethra, in counterdistinction to its adult counterpart, is seldom recognized until advanced complications of bladder and ureteral decompensation and kidney damage has occurred. The authors describe simple methods of discovering this dangerous malady in the infant and urge that doctors, nurses and mothers who attend newborn baby boys be informed concerning the condition.

Obstruction at the outlet of the urinary bladder is commonplace in senescent men, and today most laymen as well as all physicians are aware of its frequent occurrence and are alert in recognizing it.

The result has been that most men who develop prostatism are benefitted by early diagnosis and prompt safe operation and very few men who have this disease today go on to the late complications of bladder decompensation and renal insufficiency that develop with neglect. Indeed, the need for life-saving prolonged suprapubic drainage which was the rule in the past, has all but been eliminated in modern urological practice.

IN CONTRADISTINCTION, the childhood counterpart of this disease, due to congenital valves in the prostatic urethra, though not at all uncommon, is often undetected until its late complications — bladder distention, infection or uremia — cry out to be recognized.

Hugh Young in 1919 was the first urologist to report the clinical discovery of these lesions although their first recognition was described by Morgagni in 1717. The lesions consist of thin mucosal folds (Fig. 1), probably overdevelopment of the ridges that are normally situated proximal and distal to the verumontanum in the prostatic urethra. These valves interfere with the flow of urine by ballooning out toward the lumen of the urethra simulating the action of sails. The degree of obstruction is variable depending upon the height of the valves and can vary in extent from complete obstruction to minimal or none at all.

If lesions were discovered so long ago, why was there a lapse of over 200 years in recognizing the disease created by them? There are probably at least two reasons for the time lag: In the first

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place, the infantile obstructive lesion rarely produces discomfort and furthermore, little people at this age seldom have the ability to describe their difficulties. Another, more likely reason for the delay in recognizing infantile prostatism has been the lack of diagnostic modalities for its recognition.

We know that for several years following Dr. Young's description of urethral valves in 1919 there were many physicians who scoffed in disbelief at the idea of their existence.

A GENERAL ACCEPTANCE of their recognition did not come about until the 1930-40 period when the development of small cystoscopes made infant endoscopy a practical possibility. But the recognition of urethral valves by endoscopy has always been difficult even for the most skilled and experienced urologist, so a full recognition of the scope and variety of valves and their complications did not come about until the techniques of voiding urethrography were evolved in the recent past.

The voiding urethrogram is so useful that we now employ it as a routine procedure on all male children who have any micturitional symptoms or who have urinary infection. Since using this test there has been a marked contrast in the cases that have been diagnosed. Previously the majority of the patients were desperately ill with uremia, and sepsis associated with bladder and ureteral decompensation.

Now over half of these cases are diagnosed before any serious damage of the urinary tract has occurred. Indeed, we now take great pride in feeling that the uncomplicated cases which we so often diagnose today are all spared a life of invalidism by early recognition and treatment.

The urinary tract damage in children who have obstructing urethral valves can range from none at all to massive decompensation of the bladder, the ureterovesical valves, the ureters and the kidneys. In advanced cases the changes may be irreversible. The kidney of the fetus excretes urine for nearly half of the period of intrauterine life so if there is high grade obstruction the newborn baby may have massive urinary retention and kidneys that are damaged beyond the point of sustaining life.

SUCH INFANTS will survive only a few days even though the obstruction is recognized at birth and immediate drainage is established, for the child can no longer depend upon the mother's kidneys to maintain homeostasis.

Fortunately, most infants with obstructing valves survive because they have lesser degrees of obstruction. In a few of these the condition is discovered during infancy by the observation of dribbling or a pinpoint size intermittent stream, and bladder distention or infection. But most of the cases are not discovered early. Indeed, a review of our series of cases has disclosed the fact that the majority of the patients were over six years old and had serious urinary tract damage when referred for diagnosis. These simple data are an eloquent demonstration that most of the cases go too long before recognition.

All of the patients in our series with serious upper urinary tract damage gave a history of impaired micturitional behavior since infancy, and in these if nurses in the newborn nursery, the parents and the family doctor had but realized the importance of this abnormal behavior, most of the children probably could have been spared the serious damage that had occurred when the diagnosis finally was made.

In well baby clinics the world over the medical profession has advised mothers to observe the sucking as well as the bowel behavior of infants in order to discover abnormalities in these functions. Mothers also should be instructed to observe the micturitional function of their newborn baby boys. Any male infant who does not void with a full, forceful, high trajectory, uninterrupted stream should be subjected to investigation, for such a child probably has an obstructive or neurological lesion.

THE SYMPTOMS IN children who have obstructing valves depend on the degree of obstruction and the occurrence of infection. In our series

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most of the patients gave a history of a weak urinary stream and difficulty in voiding. Nearly all of them voided with an interrupted stream and nearly half of the patients had infection in the urine. All were bed wetters, and the majority of those with decompensation of the bladder also had incontinence during the day.

In recent years, since using the voiding urethrocystogram as an integral part of each urological examination in male children, we have been surprised to discover that many patients whose only complaint was nocturnal enuresis were found to have valves in the prostatic urethra and were cured by endoscopic removal of the valves. In this situation the child behaves quite like his adult counterpart who is suffering from early prostatism where the only symptom is nocturia.

The diagnosis of urethral valves is most effectively made by the voiding urethrocystogram using either the image intensifier abetted by the cinema or video tape recording, or by rapid exposure spot film technique. We have had experience with both techniques and prefer the latter because the spot films provide better definition for demonstrating the fine details of the valves.

THERE ARE TWO METHODS that have been utilized in the administration of contrast medium for these studies. The first of these is made in connection with the preliminary excretory pyelogram which is performed at the onset of the urological study. If the child is well dehydrated prior to the examination and has normal kidney function, a large (adult) dose of contrast material is injected intravenously and the material is clearly visible on films made of the bladder and urethra during micturition (Fig. 2). The child, of course, must be old enough to be cooperative, and it is essential to delay making the voiding film until the child feels that the bladder is full and needs to urinate, for only then we do get films that depict the true status of urine flow dynamics in the system under study.

This detail is an important one, and its fulfillment often requires considerable patience on the part of the X-ray technicians as well as the child. In most children the quality of the voiding urethrogram made in this manner is such that the retrograde method which requires catheterization is avoided.

When the retrograde method is employed, a catheter is introduced and is left indwelling for enough time so that the child is accustomed to its presence — usually about half an hour — then the contrast medium is introduced by syringe until the sensation of bladder fullness occurs. Then the catheter is removed with the patient standing obliquely in front of the X-ray apparatus, and while void-

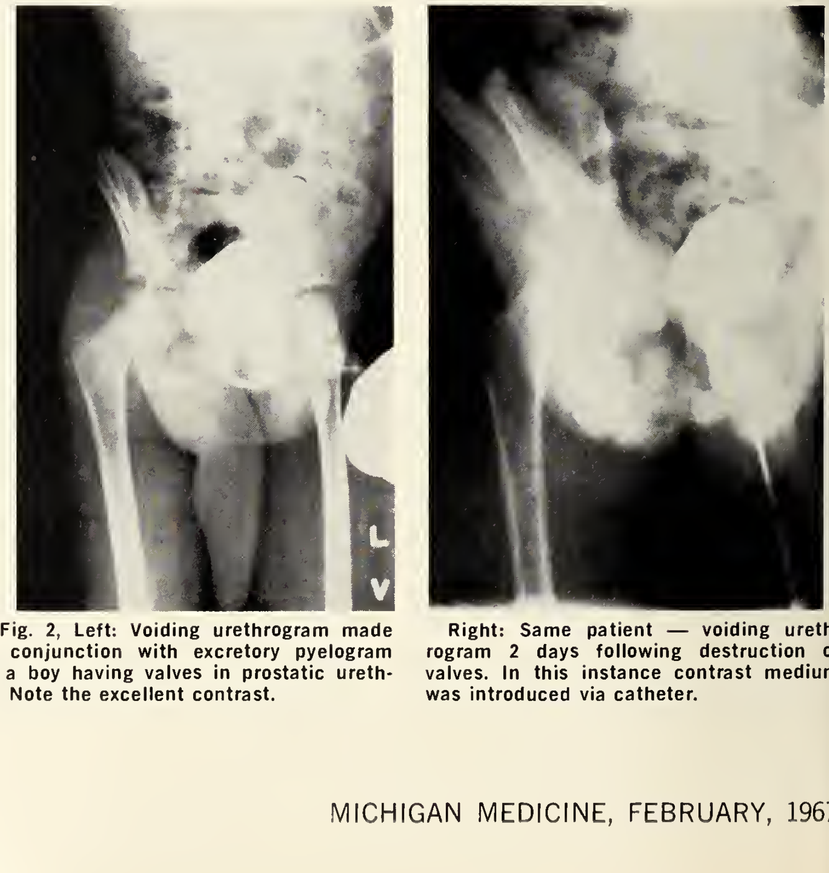

Fig. 2, Left: Voiding urethrogram made in conjunction with excretory pyelogram in a boy having valves in prostatic urethra. Note the excellent contrast.

Right: Same patient — voiding urethrogram 2 days following destruction of valves. In this instance contrast medium was introduced via catheter.

ng the exposures are made on either the biplane apid exposure or cinema or TV tape.

UNCOOPERATIVE CHILDREN or infants an be anesthetized lightly and these patients are laced on the X-ray table with a cork block under ne hip in order to obtain an oblique projection oentgenogram during urination. In such children ontrast medium is injected through a small cath-ter and when the bladder becomes distended a oiding contraction causes the beginning of urina-ion around the catheter which is quickly with-lrawn and continued voiding occurs and the roent-en exposures are made.

The features which characterize obstructing alves in the voiding urethrogram are a dilatation f the urethra down to the point of obstruction; t this point there is ordinarily a visible filling de-ect which identifies the obstructing valve (Fig. 3). The degree of dilatation observed in these cases s quite variable and appears to depend upon sev-ral factors such as the degree of obstruction and he extent of bladder decompensation.

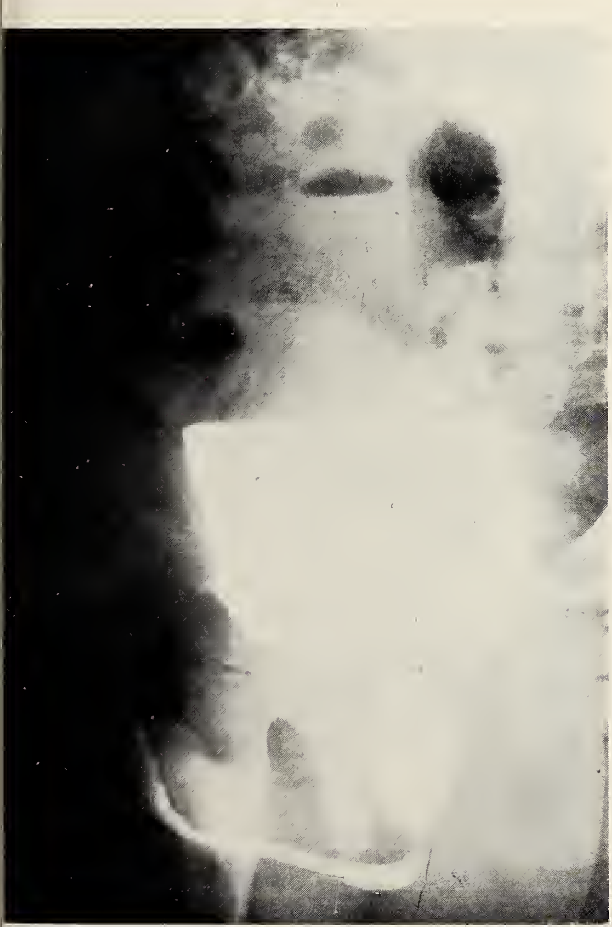

Fig. 3: A voiding urethrogram showing the characteristic ilatation above the point of obstruction identified on the ilm as a "filling defect."

In our series of cases some prostatic urethras were enormously dilated as well as elongated in children who had high-grade obstruction and a well compensated bladder. In one child who had a large diverticulum of the bladder the prostatic urethra was only minimally dilated, and it was thought that the diverticulum tended to absorb a great deal of the force exerted by the bladder during urination. In a few of the cases that had bladder decompensation and massive reflux into greatly dilated ureters, there was no dilatation of the prostatic urethra at all. The diagnosis in these cases was made by observing the valve structures on the roentgenogram and by endoscopic identification.

Male children occasionally have obstruction due to lesions other than prostatic urethral valves, and these deserve mention even though they occur but rarely. Bladder neck contracture is occasionally encountered, and its appearance in the voiding films is characterized by an elevation of the posterior vesical lip and absence of dilatation in the prostatic urethra.

Another, even rarer obstructive lesion, consists of valves in the distal urethra. We have encountered this lesion twice, and the voiding urethrogram in each case revealed dilatation of the entire urethra down to its distal portion where the obstructing flutter valve could be clearly seen.

ANOTHER CONDITION which gives rise to urinary obstruction in infant males is stenosis of the meatus. This may be congenital or acquired. In congenital stenosis there is a tiny yet forceful stream and the penile urethra can be observed to distend abnormally during urination and there is terminal dribbling after urination as the trapped urine leaves the dilated urethra. The acquired meatal stenosis usually occurs as the result of infection at the meatus in the newly circumcized infant. It often is inflamed and can interfere with urination, is usually accompanied by discomfort so the baby is apt to cry during urination. The stream here as in congenital obstruction is thin and there is apt to be terminal dribbling. These conditions are easily corrected by meatotomy.

The final step in diagnosis of urethral valves is endoscopy which is performed under general anesthesia. There are many small cystoscopes available today, but we prefer the standard McCarthy Panendoscope, using the # 16 French sized sheath, or the new fiberoptic infant resectoscope which has a sheath size of # 12 French. These two instruments are the only ones that we have found which have a focal distance that will permit ready identification of the delicate structures in the small areas where they are situated. The insertion of these instruments must be made with great gentleness in order to avoid urethral trauma which might produce stricture. If the child is an infant the surgeon may elect to perform perineal urethrotomy for introducing the instrument, for the perineal urethra has a large caliber even in infants and to open it by incision is much safer than the risk of injury to the distal urethra from instrumentation trauma there.

When the valves are found by endoscopy they are easily destroyed by touching them with an electrode activated by the high frequency current. Then a catheter is left indwelling for two days, and at the time of removal a checkup voiding urethrogram is made to determine whether complete removal of the obstruction has been achieved. On rare occasions a second endoscopic procedure has been necessary to effect a cure.

PATIENTS WHO HAVE bladder decompensation also require suprapubic cystostomy drainage until the bladder regains its tone. In those unfortunate cases where there is also dilatation of the ureters and massive hydronephrosis, cystostomy drainage may be required for months or even years to achieve optimal benefits of adequate drainage. One such case in our series needed cystostomy drainage for 14 years before his upper urinary tract was adequately rehabilitated. In some cases the damage has been so great that permanent drainage has been necessary.

It is important that the physician be aware of this fairly common lesion and that he make it a point to educate nurses as well as parents of newborn baby boys to observe the voiding patterns of the little ones. In this way the condition can be recognized early in life so that the child can have the benefits of early diagnosis and treatment. Even the child whose only symptom is bed wetting may be afflicted by this curable, yet potentially lethal condition. □

CI-581: A New Non-Barbiturate Short-Acting Anesthetic For Surgery in Burns

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Abstract: CI-581 (methylamino-cyclohexanone), a new, potent, short-acting anesthetic proved to be effective and safe when employed in the surgical treatment of burned patients. Intravenous or intramuscular administration of the agent rapidly resulted in loss of consciousness ("dissociation") without respiratory or cardiovascular depression. Advantageous aspects of this agent appear to be ease of administration, speed of induction, profound analgesia, maintenance of protective pharyngeal and laryngeal reflexes and excellent tissue compatibility. Repeated administration is well-tolerated.

In the continuing search for a safe, potent, short-acting, intravenously administered anesthetic, a number of compounds related to phencyclohexamine have recently been investigated. Phencyclidine (CI-395 or Sernyl) [1] was one of the early compounds in this series, followed by cyclohexamine (CI-400).[2] When given intravenously to human subjects, these drugs produced adequate analgesia combined with light sleep, without causing any significant cardiovascular and respiratory depression.

Marked psychic disturbances, however, including schizophrenic-type reactions and hallucinations, were frequently observed during the awakening phase, and these effects prevented clinical acceptance of the agents.

The exploration of numerous other suitable congeners of phencyclidine, with the desirable attributes of Sernyl but shorter duration of action and minimal psychotomimetic effects, led to the compound CI-581 (2-ortho-chlorophenyl 2-methylamino-cyclohexanone). The structural differences of these three compounds are shown in Figure 1.

AFTER THOROUGH clinical pharmacologic exploration of the drug with the aid of prison volunteers,[3] clinical tests were undertaken and the results proved highly encouraging.[4] CI-581 appeared particularly useful and suitable in the anesthetic management of patients undergoing brief diagnos-

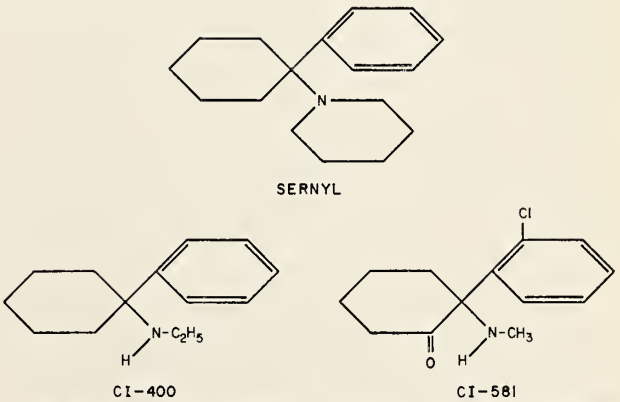

Fig. 1: Structural Formulae of Sernyl, CI-400 and CI-581

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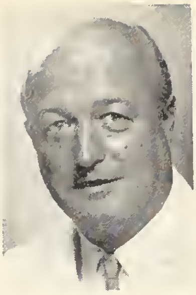

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tic and therapeutic procedures in ophthalmology.[5] Since then it has been administered to more than 900 patients undergoing a variety of surgical procedures of short duration.[6] This report is concerned with those cases in which CI-581 was used for the anesthetic management of burned patients during skin-grafting procedures.

METHODS

CI-581 is a white crystalline substance with a melting point of 259°C. It is soluble in water as a clear, colorless solution. A 10 per cent aqueous solution has a pH of 3.5. The drug is available in 20-ml. vials as a 1% aqueous solution for intravenous administration or in 10-ml. vials as a 5% solution for intramuscular use.

CI-581 was administered in connection with 151 procedures involving 34 patients (21 male, 13 female), 20 of whom were under 10 years old. The youngest patient in the series was 5 months old, and the oldest was 65 years old. Eleven patients were considered fair anesthetic risks (5-20 per cent third degree burn) while the remainder were either in the poor-risk (18 patients, 21-60 per cent third degree burn) or in the extreme poor-risk category (5 patients, 61-90 per cent third degree burn).

Table 1 shows the distribution of the various surgical procedures in this series. Preanesthetic medication consisted of belladonna drugs with or without barbiturates or narcotics, as shown in Table 2.

CI-581 was administered intravenously in 143 procedures and intramuscularly in 8 procedures. When the intravenous route was chosen an initial dose of 1 mg/lb of body weight was administered. Most patients required additional doses, which consisted of $1/3$ to $1/2$ the initial dose and were administered via an indwelling scalp-vein needle (gauge #21) whenever the patient started to respond to surgical stimulation.

The intramuscular route was chosen in smaller infants in whom suitable veins could not be found or whose activity made venipuncture difficult; the dosage was 4-6 mg/lb of body weight, administered deeply into the deltoid or gluteal muscle. Anesthesia could be prolonged by administering supplemental intramuscular increments (2 to 3 mg/lb body weight).

RESULTS

With both intravenous and intramuscular administration of CI-581 anesthesia was established in all insances. Since profound analgesia was produced in all cases there was no need for supplementation with conventional anesthetics such as nitrous oxide, ether, halothane, etc.

With intravenous doses of 1 mg/lb body weight surgical anesthesia was established within 15 to 30 seconds and lasted from 5 to 10 minutes. With intramuscular doses of 4 to 6 mg/lb body weight surgical anesthesia was established within 2 to 3 minutes and lasted from 20 to 40 minutes. With supplemental injections, then, the anesthesia could be maintained as long as necessary. Most of the procedures were completed within 60 minutes. The largest number of supplemental intravenous doses during one procedure was 10; the average number required was 6. Three infants required more than

Table 1: Distribution of 151 Surgical Procedures

Split-thickness skin grafts		144
Head and neck	(24)	
Extremities & trunk	(120)	
Debridement of wounds		2
Manipulation of joints		2
Dressing change		1
Release neck contracture		2
TOTAL		151

Table 2: Pre-Anesthetic Medication for 151 Surgical Procedures

Scopolamine	109
Scopolamine and barbiturate	29
Scopolamine and narcotic	5
Atropine	2
Atropine and barbiturate	1
Barbiturate	2
Narcotic	1
None	2
TOTAL	151

Table 3: Number of CI-581 Anesthetics per Patient

Number of Procedures	Number of Patients
1	12
2	4
3	3
4	3
5	1
6	5
8	1
10	1
13	1
14	1
15	2
TOTAL	34

one supplemental intramuscular injection for completion of the surgical procedure, but no infant needed more than three supplemental intramuscular injections.

Multiple procedures were necessary in most cases to insure adequate covering of the burned area (Table 3). CI-581 was administered 15 times to two patients, a 7-year-old girl with 80% full-thickness burns, and a 37-year-old man with 70% full-thickness burns. There was some indication that in patients who received the drug more than eight times some tolerance developed. In these cases the total anesthetic dose of CI-581 for carrying out the surgical procedure had to be increased by about 1/3 of the total dose used during earlier procedures. As a rule, when the skin fragments were placed on the burned areas, anesthesia was lightened by administering smaller supplemental doses of CI-581 ranging from 1/3 to 1/4 of the initial dose. Suturing of skin grafts could be carried out while the patient was able to respond to verbal commands without experiencing pain.

Whenever possible, CI-581 was not administered until after the skin was prepared and the patient draped. However, in some patients skin was taken from donor sites previously used for skin grafting. Preparing these areas with iodine-containing solutions and alcohol proved extremely painful. Under these conditions anesthesia was induced 5 to 10 minutes before the skin was removed. Although there was no indication of respiratory depression following the administration of CI-581, oxygen by mask was administered to several of the extremely poor-risk patients during the procedures. Laryngospasm, airway obstruction, or cyanosis did not develop during anesthesia or in the post-anesthetic recovery phase.

Slight to moderate elevation of systolic and diastolic blood pressure immediately following the intravenous administration of CI-581 was frequently observed, with return to preinjection levels within 3 to 5 minutes. Such blood pressure elevations did not occur with intramuscular injections.

The protective reflexes (pharyngeal, laryngeal, eyelid and corneal) were invariably present during the course of anesthesia. Procedures involving the head and neck could be accomplished without the use of oropharyngeal airways or endotracheal tubes. Of particular significance may be the frequent observation that a competent airway could be maintained in patients whose necks had to be maximally flexed in order to carry out skin grafting from the scalp, or in patients who had to be placed in prone position.

RECOVERY

In 138 procedures verbal contact with the patient was established within 15 minutes after completion of surgery; in the remainder patients responded within 30 minutes, except for two who needed up to 60 minutes. Complete orientation as to person, time, and place required 15 minutes in 100 instances, 30 minutes in 20 and as long as 90 minutes in the remainder of the procedures.

Most patients complained about feeling hungry when awakening. When offered food they were able to eat their normal diet 1/2 to 2 hours following surgery.

COMPLICATIONS

There were no significant operative complications. In three instances a marked blood pressure drop occurred in connection with rapid blood loss from the graft sites; the blood pressure promptly responded to blood replacement. Transient tachycardia was recorded in seven instances immediately following the intravenous injection of CI-581.

In the case of the 7-year-old child with 80% third degree burns who received CI-581 15 times over a period of four months, generalized seizures developed after the twelfth procedure. This case was complicated by respiratory insufficiency due to full thickness third degree burn involving the entire chest wall. The patient was in the prone position at the time the convulsions occurred. Since the seizures occurred three days after the anesthetic agent had been administered, a connection with CI-581 was considered unlikely.

One patient, a 65-year-old man, experienced hallucinations during the post-anesthetic recovery phase which persisted for several hours and subsided spontaneously. This patient saw objects in the room which were actually not there, but he did not pose any special nursing problem.

DEATHS

One patient, a 3-year-old boy with 80% full thickness burns, died of pseudomonas septicemia and pneumonia 10 days after his last procedure under CI-581 anesthesia. He had undergone eight operative procedures without complications.

DISCUSSION

The anesthetic management of the severely burned patient poses a number of very serious clinical problems, which may include hypovolemia, septicemia, pneumonia, hyperthermia and adrenal insufficiency. An anesthetic agent with the least toxic action on vital systems, which is potent, short-acting, non-inflammable and causes minimal impairment of respiratory and cardiovascular activity, is greatly needed to minimize the adverse effects of repeated anesthesia.

Our preliminary experience with CI-581 indicates that this drug fulfills most of the requirements mentioned above. The ability of CI-581 to produce profound analgesia without causing significant respiratory or cardiovascular depression is the most important characteristic of the agent. The maintenance of protective laryngeal and pharyngeal reflexes during anesthesia makes the drug unusually safe because aspiration of gastric contents is unlikely. There is no need for artificial support of the airway since intraoral muscles are not relaxed enough to cause mechanical obstruction of the air passage, as often observed with conventional anesthetics.

Several patients with burned areas on the back had to be kept in prone position for several weeks. It was of particular advantage that their position did not need to be changed to facilitate administration of the anesthetic.

Analgesia often outlasted the hypnotic action of the drug. This was helpful during that part of the surgical procedure in which the skin fragments were placed and sometimes sutured to the underlying tissue. Often the patient appeared to be awake but showed little reaction when skin sutures were placed and denied feeling any pain or discomfort. Usually when the patient first emerged from anesthesia, his response to questioning concerning pain was vague ("I don't know"); even when the response became quite positive he still had difficulty in interpreting the degree of pain.

After the fast intravenous injection of CI-581 transient respiratory depression is sometimes noted lasting 15 to 30 seconds. In the normal adult patients such periods of decreased respiratory activity did not produce significant changes in arterial PO_2, PCO_2, and pH.[4] However, in severely ill patients administration of oxygen via face mask seemed to be indicated in order to keep arterial oxygen saturation within safe limits.

Blood pressure elevations observed in some patients after last intravenous injections could be reduced by slower administration of the drug. No blood pressure rises occurred with intramuscular administration. No hypotension related to CI-581 was observed in this series, and in particular, no blood pressure changes occurred during position changes.

CI-581 stimulates salivary activity so that a strong antisialogogue such as scopolamine is needed to suppress mucus secretions. There seems to be little need to combine scopolamine with a barbiturate such as pentobarbital or secobarbital, since scopolamine at effective doses (0.1 to 0.4 mg, according to age) produces adequate cortical depression. There was some indication that the addition of a barbiturate to scopolamine prolonged the postanesthetic recovery period.

CI-581 possesses a wide margin of safety. While the initial intravenous dose for effective anesthesia was found to be 1 mg/lb of body weight, total doses for carrying out prolonged skin grafting ranged from 3 to 4 mg/lb of body weight and were even doubled in some prolonged procedures. Patients tolerated these large doses well. There were no indications that frequently repeated administrations of CI-581 in the same patient resulted in clinically manifested ill effects. However, development of tolerance could be detected after more than eight administrations of the drug.

More extensive and thorough laboratory studies in monkeys who received CI-581 every other day up to 29 times have just been completed.[7] The results of this study which will be reported elsewhere indicated no toxic effects on vital organ systems.

In the course of this clinical study anesthesia with CI-581 gained rapid acceptance by the patients. No patient complained about undesirable effects of the anesthetic agent although a burning sensation along the course of the vein was sometimes experienced at the time of injection, probably because of the acidity of the solution and the necessity of using very small veins in some of these severely burned patients. Thrombophlebitis, or any other manifestation of venous irritation, was not observed following intravenous administration of CI-581. Also, no induration or local irritant effect was noted following intramuscular injection.

The anesthetic state produced by CI-581 appears to be different from that achieved with conventional anesthetic agents. While there is profound analgesia, the patient is only superficially asleep; in fact, the patient appears to be "disconnected" rather than asleep. From the preliminary experimental work in laboratory animals it appears that with CI-581 sensory input is not blocked at spinal or brainstem levels, but afferent impulses are interrupted in the association area of the cortex. This has led to the introduction of the term "dissociative anesthesia."[4]

There is cause for concern in that the ease and simplicity of administration of CI-581 and its obvious suitability for anesthesia in short-lasting surgical procedures including office surgery may tempt unqualified persons to administer the drug whenever brief anesthesia is needed. The drug should not be used by any individuals who are not thoroughly prepared to cope with every emergency that can arise when a patient is anesthetized.

SUMMARY

CI-581 is a new, non-barbiturate, intravenously or intramuscularly administered, short-acting anesthetic, suitable for operative procedures of short duration. The drug appears to be particularly useful in the anesthetic management of severely burned patients.

Preliminary experience with CI-581 in anesthesia for grafting procedures in burn cases appears highly encouraging. Speed of induction, profound analgesia, limited duration of action, and therefore easy controllability, are some of the advantages. Also the drug is associated with remarkable stability of cardiovascular and respiratory function. The minimal relaxation of the neck musculature, and, particularly, the intraoral musculature, insures patency of the airway. Anesthetic complications are minimal; nausea and vomiting are virtually absent.

Ease and simplicity of administration of CI-581 may tempt unqualified persons to administer the drug whenever brief anesthesia is needed. CI-581 should not be used by any individuals who are not thoroughly prepared to cope with every emergency that can arise when a patient is anesthetized.

Although preliminary experience with CI-581 is highly encouraging, more clinical and laboratory experience is required before this agent can safely be recommended for general use in the anesthetic management of surgical patients, particularly those in the poor-risk category, such as the severely burned.

ACKNOWLEDGMENT

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REFERENCES

1. Greifenstein, F. E., DeVault, M., Yoshitaka, J., and Gajewski, J. E.: A Study of 1-Wryl Cyclohexyl Amine for Anesthesia, Anesthesia and Analgesia, 37:283, 1958.
2. Lear, E., Suntax, R., Pallin, I. M., Chiron, A. E.: Cyclohexamine (CI-400): A New Intravenous Agent, Anesthesiology, 20:330, 1959.
3. Domino, E. F., Chodoff, P., Corssen, G.: Pharmacologic Effects of CI-581, A New Dissociative Anesthetic, in Man, J. Clin. Pharmacol. and Therap., 6:279, 1965.
4. Corssen, G., and Domino, E. F.: Dissociative Anesthesia: Further Pharmacologic Studies and First Clinical Experience with the Phencyclidine Derivative CI-581, Anesthesia and Analgesia, 45:29, 1966.
5. Falls, H. F., Hoy, J. E., and Corssen, G.: CI-581: Anesthetic for Office Ophthalmic Surgery, Am. J. Ophth., 61:1095, 1966.
6. Corssen, G. and Bjarnesen, W.: Recent Advances in Intravenous Anesthesia, J. Am. A Nurse Anesthetists 34:416, 1966.
7. Bree, M. M., Feller, I., and Corssen, G.: CI-581 — Safety and Tolerance of Repeated Anesthesia in the Monkey, Anesth. and Analg. (in press)

Original Scientific Article

Clinical Experience with a New Assay For LDH and LDH Isoenzyme Activities

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Abstract: A new, rapid and precise tetrazolium salt assay for LDH activity has been given a one year's clinical testing, encompassing 4,271 assays in hospitalized patients. The assay is readily adapted to full automation without loss of sensitivity or precision and through minor modifications may be used for the biochemical differentiation of the isoenzymes of LDH.

In 1965 Babson and Phillips[1] reported a clinically applicable and important tetrazolium salt assay for the estimation of serum lactic dehydrogenase (LDH). The method, a colorimetric assay, utilized a tetrazolium salt, 2-p-iodophenyl-3-0-nitrophenyl-5-phenyl tetrazolium chloride, as a chromogenic indicator of dehydrogenase activity. Phenazine methosulfate serves as an intermediate electron carrier.

A clinical and laboratory evaluation of the new assay by the Clinical Biochemistry Section of the Department of Pathology, the University of Michigan Medical Center confirmed its advantages over other LDH assays, and in addition, the tetrazolium salt procedure was adapted to full automation by the Auto Analyzer.[2, 3]

The present report is an outgrowth of one year's clinical experience with the tetrazolium salt assay of LDH activity and also relates the introduction of a modification of the procedure as a *biochemical* measurement of the two major isoenzymes of lactic dehydrogenase.

MATERIAL AND METHODS

A. PROCEDURES:

1. Manual technic: The method of Babson and Phillips[1] was followed *precisely as outlined* in their report.*

2. Automated technic: The Capps' adaption of the former was used exclusively.[3]

3. LDH isoenzyme ratio: The method of Babson[4] was followed, using the Capps'[3] automated procedure.

B. STANDARDIZATION:

Established as recommended by Briere et al[2] and Babson and Phillips,[1] i.e., through the use of lyophilized commercial enzyme standards.†

C. ANALYSES:

1. Establishment of a normal range of serum activity in 155 blood donors-manual technic.

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* Soon to be available in kit form, "Lac Dehystrate" Reagent (W-4686) from General Diagnostics Division, Warner-Chilcott Laboratories, Morris Plains, New Jersey.

† Versatol-E and Versatol-E-N, General Diagnostics Division, Warner-Chilcott Laboratories.

2. Establishment of a normal range of serum activity in an additional 104 blood donors-automated technic.

3. Replicate analyses for both the manual and automated versions of the procedure.

4. Clinical application of the tetrazolium salt assay to total LDH activity in diverse diseases.

5. Clinical application of the LDH ratio system assay.

RESULTS

NORMAL RANGE OF ENZYME ACTIVITY IN SERUM

a. Manual technic: The average activity level in sera from 155 blood donors was 51.1 I.U. One standard deviation was ± 13 I.U. (2 S.D. activity range = 25 to 77 I.U.)

b. Automated technic: The average activity level in sera from 104 blood donors was 51.0 I.U., and a 2 S.D. range of 24-78 units.

REPLICATE ANALYSES:

To test the reproducibility of the manual tetrazolium assay, sera manifesting both normal (42 I.U.) and abnormal (150 I.U.) levels were used. The former yielded a standard deviation ± 1.1 units, the latter, a standard deviation of 2.6 units. A similar biphasic study was done for the automated LDH procedure. Ten replicate analyses of one serum yielded an average of 212.2 I.U., S.D. ± 0.8 units. Ten replicate analyses of another serum produced an average of 36.7 I.U., S.D. ± 0.3 units.

CLINICAL APPLICATIONS:

In the 12 months covering the time of this report, the Clinical Biochemistry Section of the University of Michigan Medical Center performed 4,271 LDH assays by the tetrazolium salt assay; over 3,500 of these were done by automated analysis.

A selected group of 100 abnormal sera from a variety of clinical disorders presented to the laboratory are representative.

Fifty-six patients suffered from documented and confirmed myocardial infarcts. The range of enzyme activity in these patients was always above the normal activity range and measured in this specific group from 80 to 330 I.U. Levels of activity varied and were dependent on the time of procurement of the samples and the severity of the myocardial damage. Patients with active hepatic parenchymal disease, infectious mononucleosis with secondary involvement of the liver, and intractible congestive heart failure manifested serum LDH activities from 90-420 I.U. Because of the high LDH content of the mature human erythrocyte, in vivo or in vitro, hemolysis produced high serum activity.

LDH RATIO SYSTEM ASSAY:

The normal adult, as established by this study, has a LDH ratio of 0.75 to 1.0. Tables 1, 2, and 3 illustrate the efficacy of the ratio assay in the biochemical differentiation of diseases of various organ systems.

DISCUSSION

The enzyme lactic dehydrogenase catalyzes the reversible conversion of lactate to pyruvate in the presence of diphosphopyridine nucleotide (DPN, NAD):

Lactate and DPN $\overset{\text{LDH}}{\rightleftharpoons}$ pyruvate and DPNH. This reaction forms the basis for the variety of methods available for the clinical estimation of lactic dehydrogenase activity in human fluids. Thiers and Vallee[5] and Babson and Phillips[1] have presented cogent reasons for the technical superiority of procedures employing the lactate → pyruvate reaction over the reverse or pyruvate → lactate estimations. The tetrazolium salt assay possesses these technical and kinetic advantages. Studies in this laboratory and elsewhere[1, 2, 3] indicate the assay is (1) linear with enzyme concentration; (2) precise; (3) reproducible; (4) requires a minimum (5 minutes) of incubation time and (5) is clinically reliable. The advantage of the relative ease of adaption to the auto-analyzer speaks for itself.

In the consideration of clinical reliability, it cannot be over-emphasized that lactic dehydrogenase activity serum is non-specific and should therefore be used as a confirmatory measure, rather than as a primary means for the establishment of a diagnosis. If proper consideration to routine enzymological protocol is observed, however, the upper limits of normal are not overlapped by the enzyme activity found in the sera of patients suspected of having diseases capable of producing a rise in the total LDH activity.

Since total lactic dehydrogenase activity in serum is relatively non-specific as to its tissue source, various workers have utilized the known molecular hetrogenity of the enzyme, i.e., isoenzymes as a means to more precisely pin-point organ or system specificity.[6, 7, 8] Of the variety of methods available to separate the isoenzymes of lactic dehydrogenase, differences in heat lability[9] and electrophoretic[10] separation have been most widely used by the clinical chemistry laboratory. Both are essentially physical rather than chemical methods.

Through modification of the substrate mixture used for the herein reported tetrazolium salt assay, a *biochemical* differentiation of LDH isoenzyme patterns can also be achieved. The *ratio* of enzyme activity measured in the presence of modified substrate indicates that an elevated total LDH activity is attributable to a predominance of various isoenzymes.

The assay system utilizes the same general reactions as the assay for total LDH activity but a 2 M lactate substrate (heart inhibiting substrate) and a .02 lactate-2M urea substrate (liver substrate) are substituted in place of the 0.1 M lactate used as the substrate in the measurement of total enzyme activity.

Other than for this simple substitution of substrates, the automated assay is not changed.

In the LDH ratio system the liver isoenzymes are inhibited by the incorporated urea, while the heart fraction is little effected. The ratio of absorbances is obtained by dividing the absorbance of the heart-inhibiting substrate by the absorbance of the liver-inhibiting substrate after correcting for control values, i.e.

$$\text{O.D. ratio} = \frac{\text{O.D. modified ``heart'' substrate} - \text{O.D. total LDH control}}{\text{O.D. modified ``liver'' substrate} - \text{O.D. total LDH control.}}$$

Table 1

LDH ISOENZYME REAGENT ASSAY ISOENZYME RATIO

	Myocardial Infarcts	Acute Liver Disease
	0.65	1.3
	0.60	3.0
	0.60	1.1
	0.60	1.3
	0.60	1.6
	0.40	0.9
	0.60	1.1
	0.60	1.6
	0.55	0.65
	0.60	3.0
	0.60	1.1
	0.60	0.9
	0.65	1.4
	0.70	2.5
	0.74	
	0.60	AVERAGE 1.52
	0.65	
	0.50	
	0.60	
	0.60	
	0.30	
AVERAGE	0.58	

Table 1 is illustrative of the discriminatory ability of the ratio for diseases involving the liver and heart. Patients with acute myocardial infarcts have low ratios and conversely, patients with acute liver disease manifest high ratios. The average ratio in patients with the former was 0.58; those suffering from acute parenchymal disorders of the liver presented with ratios averaging 1.52. Table 2 indicates the close correlation between electrophoretic separation and the "ratio separation" of lactic dehydrogenase in patients with disease of the liver. Table 3, representing a variety of disorders, empha-

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sizes the following: (1) There is a predominance of isoenzymes 1 and 2 in the erythrocyte and regardless of the technique, hemolysis yields an isoenzyme pattern not unlike that observed after a myocardial infarct, (2) a similar cross-reaction is seen with acute necrosis of the kidney, (3) lymphomas and leukemias present an inconstant pattern, depending on the presence or absence of hepatic involvement or hemolysis, (4) the ratio can discriminate between angina pectoris and infarct of the heart as well as between pulmonary embolus and myocardial infarct.

SUMMARY

Twelve months of clinical experience, dealing with 4,271 routine assays of lactic dehydrogenase

Table 2

ISOENZYME RATIO
CORRELATION WITH ISOENZYME ELECTROPHORESIS - HEPATIC DISORDERS

DISEASE	ELECTROPHEROGRAM	RATIO (LDH)	TOTAL LDH
Acute hepatitis	+ slow fractions	3.0	LDH = 235
Acute hepatitis	+ slow fractions	3.5	LDH = 300
Ruptured liver	+ slow fractions	2.5	LDH = 250
Decompensated cirrhosis	+ slow fractions	1.4	LDH = 200
Chronic (active) hepatitis	+ slow fractions	1.4	LDH = 160
Chronic (active) hepatitis	+ slow fractions	1.3	LDH = 152
Hodgkin's Disease with Involvement of liver	+ slow fractions	1.6	LDH = 120
Congestive heart failure	+ slow fractions	1.1	LDH = 95
Congestive heart failure	+ slow fractions	0.9	LDH = 80

Table 3

ISOENZYME RATIO
MISCELLANEOUS DISORDERS

HEMOLYSIS		Congestive Heart Failure	Pulmonary Embolus
Starr valve	— 0.50	1.1	3.1
Starr valve	— 0.50	1.3	1.1
Hemolytic anemia	— 0.50	0.9	1.2
Hemolytic anemia	— 0.50	1.0	0.8

Lymphomas and Leukemias	Angina Pectoris and Ventricular Fibrillation
0.69	1.6
1.6 (liver involved)	0.9
0.8	1.5
1.5 (liver involved)	1.3
0.8	1.0
0.9	1.0
	1.2

Kidney Disorders
.60
.56
.56
.53
.50
.70
.70
1.0

activity by a new, simple and rapid colorimetric method are presented. Aside from the inherent technical advantages of using the "forward" lactate ⟶ pyruvate reaction for the estimation of enzyme activity, the assay is readily adapted to full automation without loss of sensitivity or precision.

Minor modifications in substrate make this tetrazolium salt assay also suitable for the biochemical differentiation of the isoenzymes of lactic dehydrogenase.

REFERENCES

1. Babson, A. L. and Phillips, G. E.: A rapid colorimetric assay for serum lactic dehydrogenase. Clin. Chim. Acta. 12:210-215, 1965.
2. Briere, R. O., Preston, J. A. and Batsakis, J. G.: Rapid colorimetric (tetrazolium salt) assay for lactate dehydrogenase: A clinical and laboratory evaluation. Am. J. Clin. Path. 45:544-547, 1966.
3. Capps, R. D., Batsakis, J. G., Briere, R. O. and Calam, R. R. L.: An automated colorimetric (tetrazolium salt) assay for serum lactate dehydrogenase. Clin. Chem. 12:406-413, 1966.
4. Babson, A. L.: The chemical differentiation of tissue lactic dehydrogenase; Abstract of paper presented at the 6th International Congress of Clinical Chemistry, Munich, July 26, 1966. Enzymol. biol. clin. 6:250, 1966.
5. Thiers, R. E. and Vallee, B. L.: Analytical considerations in serum enzyme determination. Ann. New York Acad. Sc. 75:214-226, 1958.
6. Wroblewski, F. and Gregory, K. F.: Lactic dehydrogenase and their distribution in normal tissues and plasma and in disease states. Ann. New York Acad. Sc. 94:912-932, 1961.
7. Preston, J. A., Briere, R. O. and Batsakis, J. G.: Rapid electrophoretic separation of lactate dehydrogenase isoenzymes on cellulose acetate. Am. J. Clin. Path. 43:256-260, 1965.
8. Batsakis, J. G., Preston, J. A. and Briere, R. O.: Recent advances in the clinical enzymology of myocardial infarct. Mil. Med. 129:1161-1166, 1964.
9. Strandjord, P. E., Clayson, K. J. and Freier, E. K.: Heat stable lactate dehydrogenase in the diagnosis of myocardial infarction. J.A.M.A. 182:1099-1102, 1962.
10. Barnett, H.: Electrophoretic separation of lactate dehydrogenase isoenzymes on cellulose acetate. Biochem. J. 84:83-84, 1962.

ELISHA CULLEN DICK, M.D.

(Editor's Note: The following is excerpted from an article by Irwin Richman, M.D., of Harrisburg, Pennslyvania. Permission to reprint was granted by the editor of Pennsylvania Medicine, where the full article appeared in June, 1966)

Washington's Life Might Have Been Prolonged by Tracheotomy

Although he had been given the best medical care available in 1799, George Washington, with bluish skin and gasping for breath, was dying. His three attending physicians felt hopelessly ineffectual. They had diagnosed his ailment as "cynache trachealis" or "croup" and had treated him accordingly.

The patient was bled three times. Two phlebotomies were performed which produced "copious" bleeding. A third venesection, its effects precisely measured, emptied the old man of an additional thirty-two ounces of blood.

Even before calling the doctors, Washington had ordered the overseer of his plantation to open his vein. Long accustomed to being bled, he submitted to the eighteenth century home remedy as calmly as today's layman takes two aspirin tablets.

Blistering was induced on his throat by an application of cantharis (Spanish fly). He was purged with heroic doses of calomel, treated with an emetic, and further dehydrated by an injection (or enema). He was made to inhale "vapours of vinegar and water," and a poultice of soothing bran and stinging vinegar was placed on his raw, blistered throat.

AS A LAST RESORT, to draw the infection away from his throat, additional "blisters were applied to the extremities." When death inevitably came on that December 14, one of the physicians stopped the clock in the sick room. The first President of the United States was dead.

An invective storm broke around the heads of the three hapless physicians — Dr. Gustave Richard Brown of Port Tobacco, Maryland, and Drs. James Craik and Elisha Cullen Dick of Alexandria, Virginia. In a day when medicine was more an art than a science the doctors were faulted with Washington's death.

The Monday morning quarterbacks descended. They accused Craik and company of overbleeding their illustrious patient, or of not bleeding him enough. All of the critics, of course, could have saved the General (in their own minds at least) — if only they had been called. Unnerved by the contumacy, Craik and Dick issued a detailed medical account of Washington's terminal illness in an effort to quiet the acrimony, but only time was to accomplish their goal.

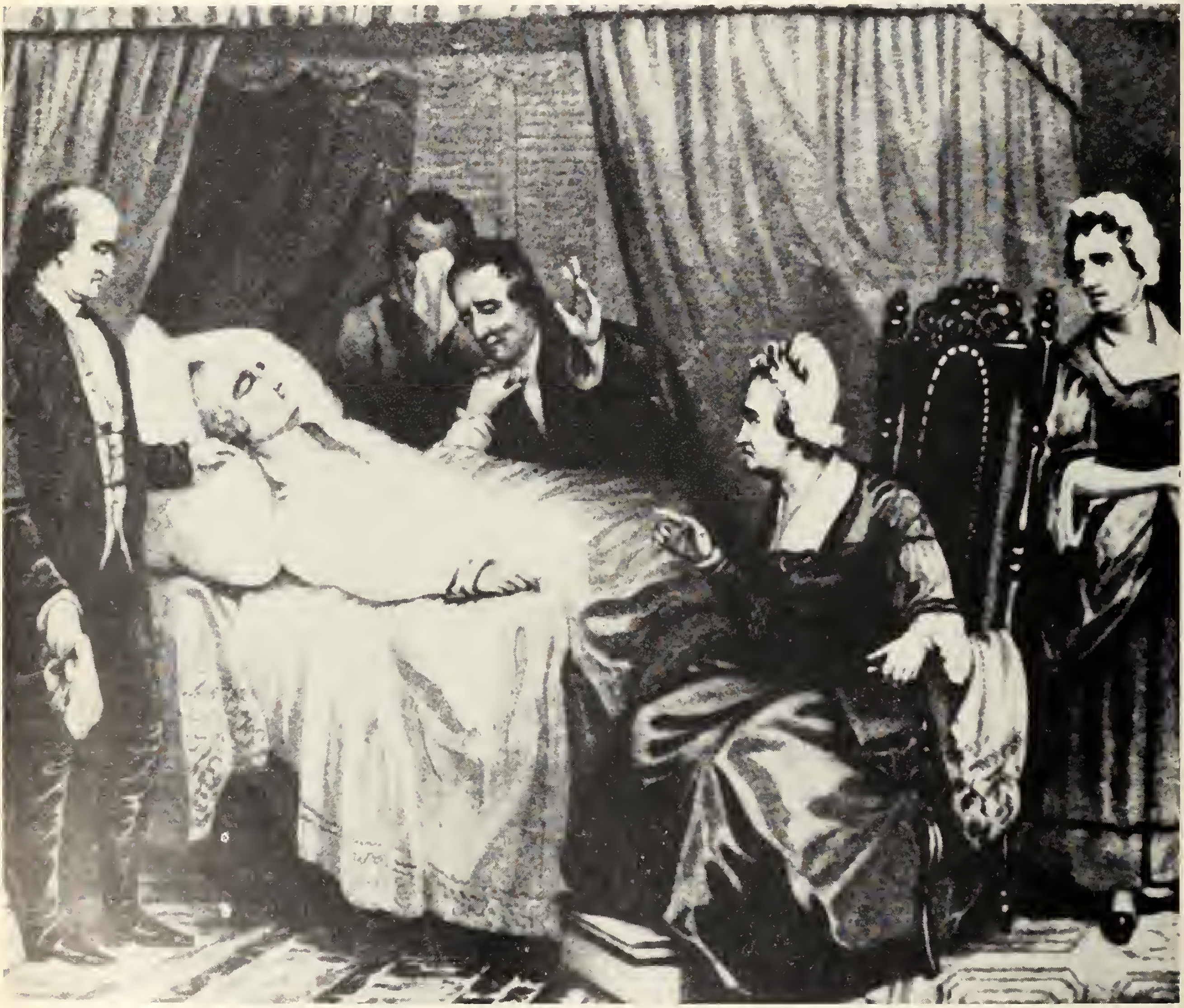
WHAT DISEASE DID "the Father of his Country" have? For years it was believed to have been diphtheria. However, modern medical historians tend to think it was streptococcal laryngitis.

After the traditional depletive remedies had been tried, one physician, Dr. Dick, suggested a radical procedure which might have saved the patient. "I proposed," the Alexandria physician wrote, "to perforate the trachea as [a] means of prolonging life and of affording time for the removal of the obstruction to respiration in the larynx. . . ."

Doctor Dick's colleagues vetoed a tracheotomy, fearing to try this experimental procedure on a celebrity. By their timidity Brown and Craik, perhaps, lost their opportunity for medical immortality, and cost Doctor Dick his.

ELISHA CULLEN DICK was an early student of Benjamin Rush, MD, at the Medical School at the University of Pennsylvania. He later studied there under William Shippen, MD, pioneer anatomist. After two years he obtained his M.D. Degree in 1782. He practiced at Philadelphia, Charleston and then Alexandria. Doctor Dick for a while served in the Cavalry, then as medical superintendent of the Port of Alexandria.

Doctor Dick was also an influential medical author and his *Facts and Observations Relative to the Disease Cynache or Croup* (Washington's ailment) brought him international recognition and caused him to be compared with medical greats such as his British contemporary, William Cullen.



Despite the ministrations of three medical men, the nation's first President lies dying. His wife Martha is close at hand hoping for a miracle. Washington, the victim of a throat infection (possibly streptococcal laryngitis) might have been saved by a tracheotomy, according to Author Richman.

Michigan Historian Dunbar Reports Medical Discovery by Doctor Beaumont

(The following is quoted from "Michigan: A History of the Wolverine State" by Willis F. Dunbar, Kalamazoo, and published by William B. Eerdmans Publishing Company, Grand Rapids, in 1965.)

"During the time when the Island was the great mecca for fur traders an incident occurred that was to lead to one of the most famous and unusual research studies in medical history. On the morning of June 6, 1822 a young voyageur named Alexis St. Martin was accidentally shot while in the Astor retail store. The young man received the entire shotgun charge in his chest and upper abdomen at point-blank range. Dr. William Beaumont, the fort surgeon, was summoned, and arrived twenty minutes later. Beaumont, a native of Connecticut, had studied medicine in the manner then customary: by associating himself with a practicing physician. He was 36 years of age in 1822, and had been surgeon at the fort for two years.

"When he first saw St. Martin he described the patient's condition as 'an appalling and hopeless case.' Membrane and muscle the size of a man's hand had been blown off, the diaphragm and left lobe of the lung had been lacerated, and the stomach had been perforated. Beaumont thought the young man could not live 36 hours. In this he was wrong. With constant care and attention by Beaumont, St. Martin miraculously withstood the shock, and after fighting a violent fever for ten days he began to improve. By the fourth week his appetite became good and healing was well under way.

"Instead of falling back into the abdomen to its natural position, the protruded portion of the stomach adhered to the chest wall. By that means the orifice in the wounded stomach remained in contact with the external wound.

"By April, 1823 St. Martin was well enough to walk about and do light work. But he was not in a condition to support himself and he became a pauper. Local authorities proposed to escape the burden of supporting him by sending him in an open boat to Montreal. Beaumont, aware this would mean death for the young man, took St. Martin into his own family, which he had to support on his meager salary of $40 a month. It was not until 1825 that the idea crystallized in his mind that he had a unique opportunity to observe the processes of digestion. For, strange as it seems, the way the wound had healed permitted free access to the interior of the stomach without impairing its functions.

"Thus began a series of experiments and observations which were to extend over a period of years. St. Martin became known as 'the man with a window in his stomach.' He was fed different types of foods by the doctor, who then observed exactly how digestion took place. The first report on his observations was published in 1826 in a magazine called the MEDICAL RECORDER.

"In 1833 Beaumont's Experiments and Observations on the Gastric Juice and the Physiology of Digestion was published as a 280-page book. This work is one of the classics of medical research, and with the passage of time it has assumed progressively greater importance. To honor Beaumont the Michigan Medical Society in 1954 restored the Astor retail store where St. Martin was wounded, and made it a depository for artifacts related to Beaumont's discoveries. Actually, St. Martin was moved from the store as soon as it was possible and taken to the fort hospital.

"Beaumont was transferred from Mackinac Island in 1825, but managed to take St. Martin along so the experiments could be continued. At his own expense Dr. Beaumont maintained St. Martin until 1834. The latter on several occasions unceremoniously departed for Canada, where he had found a wife, and Beaumont had to foot the bill for his return.

"Dr. Beaumont petitioned Congress for a grant of $1,323.75 to compensate him for the time he had spent and the expense he had incurred in treating St. Martin, since he had made the experiments 'for the benefit of the public and the advancement of science,' but Congress turned him down. He resigned as army surgeon in 1839 and became a medical practitioner in St. Louis, Missouri. He was the recipient of many testimonials and honors for his work prior to his death in 1853.

"The man whose life he had saved survived him for 27 years. St. Martin died in 1880 and was buried in Quebec. He sired a huge family of children; the count recorded by historians varies from seventeen to twenty.

Say you saw it in Michigan Medicine

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Committee on Maternal Health Explains Exam of Amniotic Fluid

BY W. W. JACK, M.D., CHAIRMAN
MSMS COMMITTEE ON MATERNAL HEALTH

Until recently the only method available in determining the existence and prognosis of Rh incompatibility between mother and fetus was the measurement of levels of circulating antibodies. This technique is still important.

Recently the spectrophometric examination of changes in amniotic fluid has been provided as a further means of prognosticating the extent of danger to the fetus as the pregnancy progresses in the face of incompatibility. (See article by Robert B. Jaffe, M.D., *et. al.*, "Management of Severe Erythroblastosis in Utero," *Michigan Medicine,* p. 621, 1966.)

The Committee on Maternal Health of the Michigan State Medical Society has prepared a desk reference card outlining the technique of amniocentesis.

While the first description of studies of the intra-amniotic space was presented by J. D. Miller, M.D., and his associates in Grand Rapids in 1930, it remained for A. W. Liley, M.D., of New Zealand to describe the extension of this technique to Rh-sensitized women. Doctor Liley has demonstrated that examination of the amniotic fluid by a spectrophotometer produces a highly reliable prognosis for the baby by indicating the severity of the disease and dictating the timing of the delivery.

With this technique available in Michigan, it is possible to outline a program to reduce perinatal mortality from erythroblastosis:

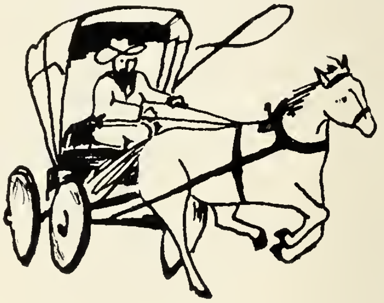
1.—All women should have an Rh determination at the time of the initial pre-natal visit to the doctor or clinic;

2.—All Rh-negative women should be tested for circulating anti-Rh antibodies. The Indirect Coombs test seems to be the most sensitive. If this initial Indirect Coombs is negative, it should be repeated at about 26 weeks gestation.

3.—If either the initial Indirect Coombs test or the one done at 26 weeks is positive in any dilution, the patient should have an amniocentesis at 28-30 weeks and again at 32-34 weeks.

Desk Reference Card #9, The Management of the Rh-Sensitized Patient, prepared by the Committee on Maternal Health of the Michigan State Medical Society, details the technique of amniocentesis, the interpretation of the results, and the places for amniotic fluid examination and consultation available to any Michigan physician who wishes it.

This Card is being distributed now. Additional copies may be obtained from MSMS Headquarters, 120 West Saginaw, East Lansing.



For Your Library

Copies of "A Century of Service in Medicine," published as a Centennial highlight by MSMS, are still available for cost, $2.00. The book, bound handsomely in blue, was written by Wm. J. Stapleton, Jr., M.D., of Detroit, the MSMS Historian. To obtain a copy, write to MSMS, 120 West Saginaw, East Lansing, and enclose a check.

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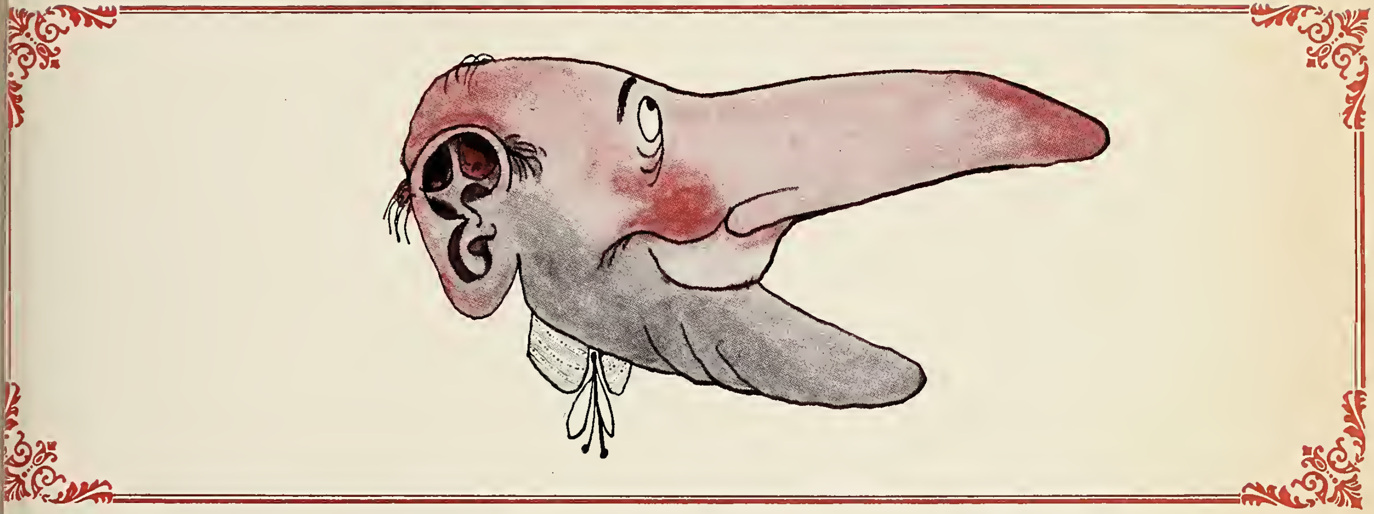

■ quickly relieves congested nose
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INDICATION: Nasal congestion. CONTRAINDICATION: Do not use in patients sensitive to small doses of sympathomimetic substances. WARNINGS: Prolonged or excessive use may cause rebound congestion. Use cautiously in patients with hyperthyroidism, coronary artery disease, hypertension, and diabetes. CAUTION: Do not shake Nasal Spray. Rinse Nasal Solution dropper or Nasal Spray tip in hot water after each use. No more than one person should use the same dropper bottle or nasal spray.

SIDE EFFECTS: Occasional local reactions: rebound congestion, slight burning or stinging, sneezing, dry nose. Occasional systemic effects: headache, drowsiness, lightheadedness, insomnia, palpitations. Overdosage in young children may produce profound sedation. DOSAGE: **Adults:** *Nasal Solution*—2 or 3 drops in each nostril every 4 to 6 hours. *Nasal Spray*—Squeeze rapidly once or twice in each nostril every 4 to 6 hours. **Children under 12:** *Pediatric Nasal Solution*—2 or 3 drops in each nostril every 4 to 6 hours. One drop should be used in infants under 6 months. *Pediatric Nasal Spray*—Squeeze rapidly once in each nostril holding tube upright; repeat every 4 hours as necessary. SUPPLIED: OTRIVIN® hydrochloride (xylometazoline hydrochloride CIBA) *Nasal Solution,* 0.1%; dropper bottles of 1 fluidounce, bottles of 1 pint. *Nasal Spray,* 0.1%; plastic squeeze tubes of 15 ml. *Pediatric Nasal Solution,* 0.05%; dropper bottles of 1 fluidounce. *Pediatric Nasal Spray,* 0.05%; plastic squeeze tubes of 15 ml. *Nasal Solutions* contain either 0.1% or 0.05% xylometazoline hydrochloride, triethanolamine, hydrochloric acid, sodium chloride, and phenylmercuric acetate 1:50,000 as preservative in water. *Nasal Sprays* contain either 0.1% or 0.05% xylometazoline hydrochloride, potassium phosphate monobasic, potassium chloride, sodium phosphate dibasic, sodium chloride, and benzalkonium chloride 1:5000 as preservative in water. *Consult complete literature before prescribing.*

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to get bacteria
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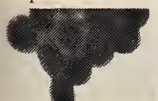
Clinical results in patients probably much like those you see every day show that an overwhelming majority responded favorably to Gantanol (sulfamethoxazole) Suspension.[1-12] These patients, numbering over 1600 in published reports, had a variety of bacterial upper respiratory infections such as otitis media, sinusitis, pharyngitis and tonsillitis, including over 700 cases caused by beta-hemolytic streptococci.[1-7]

Although in bacteriologically proven streptococcal infections penicillin remains the drug of choice, Gantanol (sulfamethoxazole) has shown conversion rates comparable to those generally seen with penicillin and apparently superior to those cited in the literature for erythromycin and broad-spectrum antibiotics.[1,2] Conversion rates have ranged from a high of 96 per cent in 229 patients[2] to a low of 65 per cent in 105 cases.[3,4] When Gantanol (sulfamethoxazole) Suspension is used in group A beta-hemolytic streptococcal infections, it is important to continue therapy in the recommended dosage for at least 10 days. In addition, Gantanol (sulfamethoxazole) Suspension has demonstrated antibacterial activity against *D. pneumoniae, H. influenzae* and *Staph. aureus.* Thus Gantanol (sulfamethoxazole) Suspension may be considered a practical choice for common bacterial U.R.I., as well as an effective alternative in the penicillin-sensitive patient with proven beta-hemolytic streptococcal infection.

β-hemolytic strep

Staph. aureus



D. pneumoniae

H. influenzae

therapy generally uncomplicated by side effects

Such favorable results as those cited in the literature[1-12] are even more meaningful in view of the fact that only 27 of 1961 patients (1.4%) discontinued therapy because of side effects. Of the total side effects reported in 107 patients (5.5%), most were mild and included rash, urticaria, itching, dizziness, headache, diarrhea, nausea and vomiting, shivering sensation, skin discoloration and crystalluria.[1-12]

Before prescribing, please consult complete product information, a summary of which follows:

Indications: Acute and chronic respiratory and urinary tract bacterial infections due to susceptible microorganisms. At present penicillin is considered the drug of choice in acute group A beta-hemolytic streptococcal infections; however, Gantanol (sulfamethoxazole) has shown an effectiveness approaching that of penicillin in a large number of patients. If employed in such infections, *it is important that therapy be continued in the usual recommended dosage for a period of at least 10 days.*

Contraindicated in sulfonamide-sensitive patients, pregnant females at term, premature infants or infants during first 3 months of life.

Warnings: Use only after critical appraisal in patients with liver damage, renal damage, urinary obstruction or blood dyscrasias. If toxic or hypersensitivity reactions or blood dyscrasias occur, discontinue therapy. In intermittent or prolonged therapy, blood counts and liver and kidney function tests should be performed. Data insufficient on prolonged or recurrent therapy in chronic renal diseases of children.

Precautions: Observe usual sulfonamide therapy precautions, including maintenance of an adequate fluid intake. Use with caution in patients with histories of allergies and/or asthma. Patients with impaired renal function should be followed closely since renal impairment may cause excessive drug accumulation. Occasional failures may occur due to resistant microorganisms. Not effective in virus or rickettsial infections.

Adverse Reactions: Following may occur: headache, nausea, vomiting, urticaria, diarrhea, hepatitis, pancreatitis, blood dyscrasias, neuropathy, drug fever, Stevens-Johnson syndrome, skin rash, injection of the conjunctiva and sclera, petechiae, purpura, hematuria and crystalluria.

Dosage: Children—1 teasp./20 lbs initially, followed by ½ teasp./20 lbs b.i.d. *Adults*—4 teasp. initially, followed by 2 teasp. b.i.d. or t.i.d., depending upon severity of infection.

How Supplied: Suspension 10%, 0.5 Gm sulfamethoxazole/5 cc teasp., cherry-flavored, bottles of 16 oz.

References: 1. Braden, B., and Colmore, J. P.: *J. Oklahoma M.A., 57*:7, 1964. 2. Alban, J.: *Am. J. Dis. Child., 109*:304, 1965. 3. Reichelderfer, T. E.: *Clin. Med., 71*:1045, 1964. 4. Jackson, H.; Cooper, J.; Mellinger, W. J., and Olsen, A. R.: *Southwestern Med., 44*:246, 1963. 5. Braden, B.; Colmore, J. P., and Cummings, M. M.: Antimicrobial Agents Annual—1960, p. 54. 6. Peters, J. H.: Data adapted from a Scientific Exhibit presented at the Spring Meeting of the American Academy of Pediatrics, April 26-29, 1965. 7. Peters, J. H.: Antimicrobial Agents and Chemotherapy—1961, p. 406. 8. Elia, J. C.: *Eye Ear Nose & Throat Month., 41*:722, 1962. 9. Patton, J. M.: *West. Med., 5*:46, 1964. 10. Chastain, P. J.: *J. Florida M.A., 48*:816, 1962. 11. Grater, W. C.: *Antibiotics & Chemother., 12*:450, 1962. 12. Exline, A. L.: *Colorado GP, 5*:(5),11, 1963.

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Marks, V., and Dawson, A.: Brit. M. J. *1*:293, 1965.

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Chosen for Health Hall of Fame

The Michigan Health Council on January 19 elected three new members to its Hall of Fame: Albert C. Furstenberg, M.D., John M. Sheldon, M.D., and Mr. William S. McNary. Dr. Furstenberg is Dean Emeritus of University of Michigan Medical School. Dr. Sheldon is Director of the Department of Postgraduate Medicine at University of Michigan. Mr. McNary is President of Michigan Blue Cross. All three have made many accomplishments in the field of health.

Andrew Pattullo, M.D., took office at the MHC Board Annual Meeting as President of the Health Council, and Harry A. Towsley, M.D., of Ann Arbor, was named President-Elect. Austin Smith, M.D., Chairman of the Board of Parke, Davis and Company was elected to the board of the Michigan Health Council.

YOU'RE INVITED TO MICHIGAN HEART PROGRAM

DETROIT . . . The Frank N. Wilson-Gordon B. Myers Memorial Lecture will be given at the annual Michigan Heart Association Scientific Program, February 24-25 by A. R. Feinstein, M.D., of Yale University. He will speak at 1:20 p.m., February 25 on "Recent Concepts of the Epidemiology, Prevention and Prognosis of Rheumatic Fever."

Ross V. Taylor, M.D., Jackson, MHA President, points out the 1967 scientific program will begin at 2 p.m., February 24 and conclude at 5 p.m., February 25. Michigan speakers will be joined by other national authorities from New Orleans, Houston, New Haven, Iowa City, New York City and Minneapolis.

(Early details about the meeting appeared in the December issue of *Michigan Medicine*)

MATERNAL WELFARE PROGRAM SET MARCH 15-16

FLINT . . . "MSMS members are urged to register soon for the Sixth Annual Michigan Conference on Maternal and Perinatal Welfare at Flint, March 15-16," urges W. W. Jack, M.D., Grand Rapids. Doctor Jack is chairman of the sponsoring MSMS Committee on Maternal Health.

A faculty of distinguished Michigan medical educators will be expanded for the Conference with Philip R. Dodge, M.D., head of pediatrics at Washington University School of Medicine, and S. Leon Israel, M.D., University of Pennsylvania School of Medicine professor and editor of the *Obstetrics and Gynecology* journal.

A final program will be mailed soon to all MSMS members.

TRIBUTE PAID TO MSMS SPEAKER LIGHTBODY

DETROIT . . . In a recent Sunday feature of the *Detroit News,* Science Editor Jean Pearson praised James J. Lightbody, M.D., Detroit, Speaker of the MSMS House of Delegates. In part, she wrote:

"Doctor James J. Lightbody is a rare man — skilled physician, excellent administrator, talented writer and shrewd commentator. As Speaker of the Michigan State Medical Society House of Delegates, he has expertly kept that policy-making body on course through many stormy sessions with his deft, subtle sense of humor, keen sense of timing and firm, though light-reined diplomacy."

PROMOTE FAMILY LIFE EDUCATION: The Committee on Lay Education, a subcommittee of the MSMS Maternal Health Committee, met recently in East Lansing to plan an educational effort in the field of Family Life Education during April and May. Shown here discussing the program are, left to right, James E. Harryman, M.D., of Muskegon, chairman of the committee; Eleanor P. Skufis, M.D., of Adrian, and Mrs. Pauline Iyenaga, from the Michigan Department of Public Health in Lansing, both members of the advisory committee.

Johnson Lecture May 23 at U-M

Francois Jacob, renowned French biologist and Nobel Prize winner, will present the 1967 Donald E. Johnson Cancer Lecture at the University of Michigan, May 23, at the Rackham Building.

Dr. Jacob's lecture will be the first in a special Sesquicentennial Symposium on "Control and Regulatory Mechanisms in Biology."

A prominent civic leader in Flint, Mr. Johnson has done much to further cancer research in Michigan and the nation.

AID SCHOLARSHIP FUND

The Oakland County Woman's Auxiliary raised more than $1,200 at its 1966 Theatre Benefit Party for its Scholarship Fund.

Formula TV Program Describes MSU Plans

Every month some of the "Formula" television programs over WJIM-TV, Lansing, produced by the Michigan Association of the Professions, deal with medicine and health-related topics.

During the past month, the "Formula for MSMS Medical School" featured Dean Andrew D. Hunt, Jr., M.D. The January topics included "Formula for Pre-Professional Campus," and "Formula for Special Education" during January.

Hugh W. Brenneman, MSMS Executive Director, is the moderator for the weekly half-hour program.

HUDSON SPEAKS IN DETROIT

AMA President Charles L. Hudson, M.D., spoke to the Economic Club of Detroit, Monday noon, January 30.

Plan to Assist Viet Children

War-maimed Vietnamese children may be brought to Detroit for medical care as the result of the newly-organized Committee of Responsibility to Save War-Burned and War-Injured South Vietnamese Children.

Through the donated services of physicians and hospitals, the Committee hopes to treat as many as 300 seriously injured South Vietnamese children in American hospitals.

Paul Lowinger, M.D., of the Lafayette Clinic, is a member of the national executive committee and coordinator for the Detroit area.

"We have a few volunteers in Detroit, but we hope that more doctors and some hospitals will volunteer," Doctor Lowinger said.

Those wishing to donate services or money should contact Dr. Lowinger or the Committee of Responsibility, Inc., 777 United Nations Plaza, 7F, New York City 10017.

Hospital Director Moans Under Weight Of Medicare Details

A six-month round-up of the effects of Medicare on hospitals, according to Ernest C. Laetz, associate director of the University of Michigan Hospital, reveals: a slight increase in inpatients over age 65, a decrease in elderly outpatients and a backlog of $750,000 of bills-in-process, due in part to a morass of clerical details. Lengthy and exacting government forms must be completely satisfied before attempting to collect Medicare payment from the government, Laetz reported.

Laetz points out that lawmakers seem to have little concern over the administrative and clerical headaches borne out of their decisions.

BOARD OF EDUCATION APPROVES MSU 4-YEAR MED SCHOOL; FUNDS NEEDED

The Michigan State Medical Society, which played an effective role in the action January 25 when the State Board of Education approved a four-year medical school for Michigan State University, now is supporting a MSU request for necessary funds from the legislature.

The Board action also called for expansion of medical schools at the University of Michigan and Wayne State University.

THE APPROVING vote on the MSU request was 5-0, with one board member absent and two abstaining because they are employed in the state's university system. Approving the proposal were Peter Oppewall, Marilyn Jean Kelley, Edwin L. Novak, James O'Neill, and Thomas Brenan. Carmen L. Delliquadri was absent, and Leroy Augenstein and Charles E. Morton abstained because of their university affiliations. The Board previously had voted 4-4 on December 21.

The new school is expected to be able to expand from its present two-year program to have approximately 100 first-year enrollees by 1970.

IF FUNDS ARE provided, the University of Michigan Medical School will by that time have increased its enrollment from 200 to 210 or more, and Wayne State Medical School enrollment will increase from 125 to about 200.

Endorsing the Board's action, C. Allen Payne, M.D., MSMS President, stated, "The public is fortunate that MSU can expand so easily to produce future doctors of medicine. MSU already has educational programs in nursing, veterinary medicine, social work, medical technology, clinical psychology and other related health vocations. Because of its excellent courses, laboratories, classroom buildings, professors, libraries, etc., MSU is better able to produce doctors quicker and at less cost than any other Michigan university not already having a medical school."

The MSMS Council at its July meeting had endorsed the MSU request for a full medical school, and the House of Delegates in September also called for legislative action.

Ylvisaker New Treasurer, Others Renamed

John Richard Ylvisaker, M.D., Pontiac, is the new Treasurer of the Michigan State Medical Society, elected by The MSMS Council January 25 at the annual meeting of The Council.

Renamed by The Council to present positions were Oliver B. McGillicuddy, M.D., Lansing, as Secretary; George H. Lowrey, M.D., Ann Arbor, as Scientific Editor of *Michigan Medicine*; Hugh W. Brenneman, as Executice Director; and Warren Tryloff, as Associate Executive Director.

Doctor Ylvisaker, who has had considerable experience in financial matters, succeeds William H. Hyland, M.D., who had served as Treasurer for the past 14 years until his death last July 18.

As of January 11, 1967, 2,607 institutions had fully qualified to participate in the Medicare program, representing a total of 188,998 nursing beds.

Surgeons to Hear Michigan MDs

Michigan is again furnishing a number of distinguished physicians for active roles in sectional meetings of the American College of Surgeons.

Reed M. Nesbit, M.D., Ann Arbor, is president-elect of the American College of Surgeons.

On the preliminary program for the Colorado Springs meeting, February 15-17, are Richard C. Schneider, M.D., Ann Arbor, who will deliver a paper on "Athletic Injuries," and John O. Esslinger, M.D., Birmingham, speaking on "How I Manage Dislocation of Patella." Serving as members of panel discussions will be E. S. Gurdjian, M.D., Detroit, "Cerebrovascular Disease," and Dr. Schneider, "Trauma to the Head and Face" and "Spinal Injuries."

Six Michigan physicians are scheduled for the New York program, February 27-March 2. Half of them will present papers: Bruce Proctor, M.D., Royal Oak, "The Present Position of Tympanoplasty in Surgery of the Middle Ear;" James A. Ferguson, M.D., Grand Rapids, "Anal Stenosis;" Norman D. Nigro, M.D., Detroit, "Rectal Prolapse."

Serving on panel discussions will be: Charles G. Child, III, M.D., Ann Arbor, moderator of "Impact of Medicare on Graduate Surgical Education;" T. Manford McGee, M.D., Detroit, "Unsolved Problems in Stapes Surgery;" and Richard C. Schneider, M.D., Ann Arbor, "Mechanisms of Serious and Fatal Football Injuries."

Presenting a motion picture on "Silver Nitrate Wet Treatment of Burns" at the San Diego meeting, January 23-24, was to have been Carl A. Moyer, M.D., Houghton. Reed O. Dingman, M.D., Ann Arbor, served on a panel discussion of "Fractures of the Facial Bones."

Physicians Help In Area Planning

Physicians have been helping in several regions of the Michigan Health Facilities Planning Council to organize local council groups. The North Central District has elected Myrton M. Riggs, Cheboygan newspaper publisher, as president of the council. E. F. Sladek, M.D., of Traverse City, will serve as second vice-president.

The Upper Peninsula has been divided into four zones for planning purposes. The Council named Kenneth Bray, Thomas Renn, Rev. Paul Landstrom, and Kenneth J. Shouldice, Ph.D., as chairman of the four zones.

The Greater Kalamazoo area named Dwight L. Stocker, Kalamazoo industrialist, as temporary chairman of the council. Among those who are planning guidelines for the council is William Birch, M.D.

In other downstate areas plans for organization are nearing completion.

The MSMS is a member of the MHFPC.

Kingswood Lecture Spotlights Dement

The Kingswood Hospital's "1st Anniversary Lecture," on February 13 at 8:30 p.m., will be presented by William C. Dement, M.D., Associate Professor of Psychiatry at the Stanford University School of Medicine. Dr. Dement is best known for his investigations in the area of Rapid-Eye-Movement Sleep.

Frederick Shevin, M.D., chairman of the program committee, has invited all physicians who are interested to attend. Kingswood Hospital is located at 10300 W. Eight Mile Road (between Wyoming and Meyers), Ferndale.

Urges Members Read Prof. Hall's Articles

"Be it evolution or revolution, the health insurance industry and medicine face drastic changes in the next two decades."

So writes Charles P. Hall, Jr., Ph.D., Professor of Insurance at Temple University, Philadelphia, in the January issue of *Michigan Medicine.*

The attention of MSMS members is directed to the Hall article by Dale L. Kessler, M.D., Chairman of the MSMS Committee on Socio-Economics. The article on "The Future of Health Insurance, Prepayment and Medicine" is the first in a series of position papers commissioned by the MSMS Committee. The Committee has suggested that MSMS members may wish to file the Hall article for study and review.

'66 New Drugs At All-Time Low

FROM AMA BUREAU IN WASHINGTON

Expenditures on prescription drug research and development reached a new high, but fewer new products actually reached the market in 1966 than during any single year on record.

C. Joseph Stetler, president of the Pharmaceutical Manufacturers Association, said that the situation was attributable to several factors, including difficulties encountered under federal drug regulations.

Total research and development expenditures during 1966 were estimated by Mr. Stetler at about $400 million. He said that only 11 basic new products had been marketed in the year, compared with 23 in 1965, 17 in 1964, 18 in 1963, 28 in 1962, and 41 in 1961. The peak year was 1959 when 63 new products were introduced.

Tells Institute Smoking Linked to Blood Pressure

New evidence indicating that tobacco smoking causes blood pressure to rise because of the effects of nicotine on the sympathetic nervous system was reported January 18 by a Michigan State University associate professor of physiology and medicine at the Michigan Institute on Smoking and Health at Kellogg Center.

Robert M. Daugherty, M.D., Ph.D., reported that investigators indicate that cigarette smoking causes the release of adrenaline by the adrenal glands. The adrenaline, in turn, increases the heart rate and affects nerve cells which cause muscles around arteries to contract. This constricts arteries, raising the blood pressure just as squeezing a hose carrying water would cause an increase in water pressure.

In his experiments Dr. Daugherty used an artificial lung to expose blood to cigarette smoke in isolated parts of dogs' bloodstreams.

AMA News Reports MSMS VD Activities

The efforts of MSMS to work through the Michigan Congress of Parents and Teachers (PTA) to reach its 300,000 members with a venereal disease educational and control message were featured on the front page of the AMA News in its January 9 issue. The AMA had checked with the national PTA office, which reported that the MSMS-Michigan PTA project was believed to be the first of its kind in the nation.

On the local level many physicians are speaking to their local PTA meetings.

The Michigan VD efforts have been conducted jointly by the VD, Public Health and Public Relations Committees.

Explore Ways to Increase Supply of GPs in Michigan

What suggestions would you make to increase the supply of family practitioners in Michigan?

The complex problem of the declining number of family physician is being studied now by a newly-appointed MSMS Committee.

The Committee was appointed by MSMS Council Chairman Robert J. Mason, M.D., as an outgrowth of Resolution 50 adopted by the 1965 MSMS House of Delegates.

Some of the many ramifications were studied during 1965-66 by the MSMS Education Liaison Committee, which meets with the three Michigan Medical School deans. The Committee, with Don Marshall, M.D., Kalamazoo Councilor, recommended the appointment of a special subcommittee to consider the problems of general and rural practice and its relations to medical school curricula.

John B. Rowe, M.D., Flint, is chairman of the new MSMS Committee.

THE COMMITTEE is studying in detail now the new Report of the Ad Hoc Committee on Education for Family Practice of the AMA. The 58-page booklet, entitled "Meeting the Challenge of Family Practice" offered several recommendations for further consideration by the AMA, state societies, medical schools and others.

The AMA Committee work, led by Chairman William R. Willard, M.D., suggested "that medicine needs a new kind of specialist, the family physician who is educated to provide comprehensive personal health care."

The new MSMS Committee is looking at each of the six AMA Committee recommendations, which state:

(1) "Major efforts should be instituted promptly to encourage the development of new programs for the education of large numbers of family physicians for the future, as described in the body of this report. The educational programs should relate to all levels of medical education, including pre-medical preparation, medical school education, internship and residency training, and continuing medical education. Keynotes should be excellence comparable to programs in other specialties and flexibility to permit the design of programs which will meet the needs and interests of individual physicians."

(2) "Medical schools and teaching hospitals should be urged to explore the possibility of developing models of family practice, in cooperation with the practicing profession."

(3) "New sources of financial assistance should be developed for the support of family practice teaching programs. Substantial funds should be made available for all aspects of the programs, including the conduct of the educational program, the recruitment and training of full-time faculty, the development of facilities and models of family practice, and the conduct of research in patient care and community medicine."

(4) "RECOGNITION AND status equivalent to other medical specialties should be given to family practice. An appropriate system of specialty certification should be provided for those who have completed approved educational programs and have demonstrated their competence as family physicians. The graduate program (i.e., internship-residency program) should be an integrated whole, evaluated for accreditation by one body rather than two."

(5) "Careful attention should be given to other factors which should make the environment for family practice more favorable and serve as incentives to medical students and young physicians to enter this field."

(6) "Careful study should be made of the effect of pre-medical programs and the admission procedures, curricula and student evaluation policies of medical schools upon the production of family physicians."

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References: 1. Pillsbury, D. M., Shelley, W. B., and Kligman, A. M.: A manual of cutaneous medicine, Philadelphia, Saunders, 1961, p. 79. 2. Barber, M., and Garrod, L. P.: Antibiotic and chemotherapy, Baltimore, Williams and Wilkins, 1963, p. 111.

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Jan. 20-21 – Michigan State Association of Industrial Nurses, Sheraton-Cadillac Hotel, Detroit

Jan. 24 – Detroit Cancer Club, Wayne County Medical Society Headquarters, 1010 Antietam Road, Detroit

Jan. 25 – Thyroid Workshop, Wayne State University School of Medicine, Detroit

Feb. 14 – Galens Honorary Medical Society Lectureship, AMA President Charles Hudson, M.D., University of Michigan, Ann Arbor

Feb. 16 – Spring Conference of the Woman's Auxiliary to the Michigan State Medical Society, Whittier Hotel, Detroit

Feb. 24-25 – Heart Days Forum, Michigan Heart Association, Sheraton-Cadillac Hotel, Detroit

Mar. 8 – The Council, MSMS Headquarters, East Lansing

Mar. 14 – Michigan Welfare League, Legislative Forum, Civic Center, Lansing

Mar. 15-16 – Annual Michigan Conference on Maternal and Perinatal Welfare, Pick-Durant Hotel, Flint

Mar. 17-22 – National Science Teachers Association, Detroit

Apr. 3 – Beaumont Lecture, Wayne County Medical Society Building, Detroit

Apr. 4 – Annual Membership Conference, Michigan League for Nursing, Kellogg Center, Michigan State University, East Lansing

Apr. 19 – The Council, MSMS Headquarters, East Lansing

Apr. 26 – Muskegon Trauma Day, Muskegon

Apr 27-28 – Michigan College Health Association Annual Meeting, North Campus Commons, University of Michigan, Ann Arbor

May 1-3 – The Initial Management of the Acutely Injured Conference, Rackham Lecture Hall, the University of Michigan, Ann Arbor

May 4 – Michigan Thoracic Society, Spring Meeting, Ann Arbor

May 8-12 – American Psychiatric Association, Cobo Hall, Detroit

May 17 – Muscle Symposium, Wayne County Medical Society Building, Detroit

May 17-19 – Michigan Public Health Association Conference, Pantlind Hotel, Grand Rapids

May 31 – The Council, MSMS Headquarters, East Lansing

June 3-4 – Michigan Kidney Foundation, Sixth Annual Kidney Disease Symposium, University of Michigan Medical Center, Ann Arbor

June 8-10 – 71th Annual Meeting of Michigan Upper Peninsula Medical Society, Escanaba

June 18 – Annual Convention of the Woman' Auxiliary to the American Medical Association Atlantic City, New Jersey

June 18-22 – 1967 AMA Annual Convention, Jersey City, New Jersey

July 13-15 – The Council, Grand Hotel, Mackina Island

Aug. 25 – The Council, MSMS Headquarters, Eas Lansing

Sept. 24-26 – MSMS House of Delegates, Pantlin Hotel, Grand Rapids

Sept. 26-27 – MSMS Woman's Auxiliary, Pantlin Hotel, Grand Rapids

Sept. 27 – Dinner Dance, Pantlind Hotel, Gran Rapids

Sept. 27-29 – MSMS Annual Scientific Session Civic Auditorium, Grand Rapids

Sept. 27-28 – Michigan State Medical Assistant Society Convention, Mr. President Motel, Gran Rapids

AMA Board of Trustees Picks 11 MSMS Members

The AMA continues to depend upon many MSMS members for guidance and advice to AMA councils and committees, observes MSMS Past President Luther R. Leader, M.D., now Chairman o the MSMS delegation to the AMA. He reports the appointment and reappointment by the AMA Board of Trustees of 11 MSMS members to serv on AMA committees.

Reappointments include: Charles G. Child, III, M.D., Ann Arbor, Committee on Nursing; Leonard E. Himler, M.D., Ann Arbor, Joint Committee on Mental Health in Industry; Herbert A. Raskin, M.D., Detroit, Committee on Alcoholism and Addiction; William D. Robinson, M.D., Ann Arbor, Council on Foods and Nutrition; Richard C. Schneider, M.D., Ann Arbor, Committee on Medical Aspects of Sports and also the Subcommittee on Classification of Sports Injuries; Maurice H. Seevers, M.D., Ann Arbor, Committee on Alcoholism and Addiction, and George W. Slagle, M.D., Battle Creek, Committee on Health Manpower.

Reappointed to subcommittees of the Committee on Rating of Mental and Physical Impairment were: Donald J. Birmingham, M.D., Detroit, Chairman, Subcommittee on Skin; Charles P. Hodgkinson, M.D., Detroit, Subcommittee on Reproductive and Urinary Systems, and John W. Rebuck, M.D., Detroit, Subcommittee on Hematopoietic and Lymphatic Systems.

Named in November to the Committee on Rating of Mental and Physical Impairment was Donald J. Birmingham, M.D., Detroit.

red J. Drolett Retires; Vas Foremost MD in '58

The oldest member of the Ingham County ledical Society, Fred J. Drolett, M.D., Lansing, s retiring after 60 years of practice.

A native of Port Huron, Dr. Drolett has been hief of obstetrics at St. Lawrence and Edward V. Sparrow Hospitals, and in 1958 the Michigan tate Medical Society named him Michigan's Fore- nost Family Physician.

srael, Banquet Speaker For Maternal Welfare Conference in Flint

A nationally-recognized expert in obstetrics and ynecology will speak in Flint at the Sixth Annual lichigan Conference on Maternal and Perinatal Velfare, March 15-16. He is S. Leon Israel, M.D., hiladelphia, Professor of Obstetrics and Gyne- ology at the University of Pennsylvania School of ledicine.

Doctor Israel's speech, to be given at the March 5 banquet, is entitled "The Role of the Phy- ician in Family Life Education."

A graduate of the University where he now eaches, Doctor Israel is a member of the Amer- can Association of Obstetricians and Gynecologists, ie American Gynecological Society, the American ollege of Obstetricians and Gynecologists, and ie American College of Surgeons.

'Doctor Collects Art" Show Planned for '68

The MSMS Council has expressed its willing- ess to cooperate with Alfred Golden, M.D., Hunt- ngton Woods, and the Detroit Institute of Arts produce a second showing of selected art works ollected by physicians and their wives at the 1968 nnual Session in Detroit.

The first such showing of physicians' collections as initiated at the 1965 Centennial Session rough the cooperation of Doctor Golden, the rts Commission of the City of Detroit, and the rustees of the Founders Society of the Detroit nstitute of Arts. It was well received and in- erested parties have wanted to repeat the show t the next MSMS Annual Session in Detroit.

Committees Planning '67 MSMS Annual Session

MSMS Committees and staff members are busy with early plans for the 1967 Annual Session in Grand Rapids, September 24-28.

Plans are now underway for the House of Delegates session, September 24-25-26 at the Pantlind Hotel, and the Scientific Session, September 27-28 at the Civic Auditorium.

Already at work are Harold H. Hiscock, MD, Flint, General Chairman of Arrangements; H. A. Towsley, MD, Ann Arbor, Annual Session Scientific Program; Dale L. Kessler, MD, Grand Rapids, Local Chairman of Arrangements; and Craig E. Booher, MD, Grand Rapids, Chairman of the Scientific Exhibits Committee.

These children are now able to climb stairs through the efforts of the National Society for Crippled Children and Adults. Last year the Michigan Society raised $800,000, three-fourths of which came from the Easter Seal Campaign, to help causes such as this. The 1967 campaign dates are Feb. 20-March 26. Physicians on the State Board of the Michigan Society include Leonard F. Bender, M.D., Ann Arbor; P. C. Robertson, M.D., Ionia; George M. Brown, M.D., Bay City, and Edward F. Sladek, M.D., Traverse City. (NSCCA photo)

BELOW in the article is a list of Michigan communities seeking famil physicians. AT RIGHT is a chart of 57 Michigan communities no registered for 128 specialists. Physicians seeking to locate in Michiga communities and communities actively looking for physicians ar served through the MD Placement Service of the Michigan Healt Council, 712 Abbott, East Lansing.

200 Michigan Communities Registered With MD Placement Service for Doctors

As a service to the people of Michigan and the profession of medicine, the Michigan Health Council conducts the M.D. Placement Program under the guidance of the Michigan State Medical Society.

Inaugurated in 1953, with less than 25 Michigan communities seeking assistance, the program has expanded rapidly as the need for doctors of medicine has grown.

The Michigan Health Council currently has 140 communities that are seeking general practitioners. These include:

Upper Peninsula: Calumet, Crystal Falls, Escanaba, Hancock-Houghton Area, Iron Mountain, Laurium, Marquette, Norway, Republic Area, Rock, Sault Ste. Marie, Stephenson-Daggett Area, Newberry, Ewen, Ishpeming.

North Central: Alpena, Atlanta, Cadillac, Charlevoix, Cheboygan, Harbor Springs, Lincoln, Mackinac City, McBain, Onaway, Posen, Skidway Lake, Vanderbilt, Northport, Rogers City.

West Central: Alma, Baldwin, Barryton, Bath, Bear Lake, Big Rapids, Bitely Area, Breckenridge, Carson City, Cedar Springs, Cutlerville, Edmore, Evart, Fruitport, Grand Haven, Greenville, Hesperia, Holton Idlewild, Kent City, LeRoy, Manistee, Muskegon, Ovid, Portland, Ravenna, Reed City, St. Johns, St. Louis Area, Shelby, White Cloud, Zeeland.

East Central: Auburn, Bad Axe, Bay City, Byron, Caseville, Coleman, Columbiaville-Otter Lake Area, Deckerville, Durand, Elkton, Emmett, Fairgrove-Akron Area, Flint, Hale, Laingsburg, Lapeer, Mayville, Memphis, Morrice, Mt. Pleasant, Saginaw, St. Clair, Sandusky, Standish, Owosso, Gla win, Cass City, Essexville, Goodrich, Metamor Millington.

Southwest: Adrian-Tecumseh Area, Albion, A legan, Bangor, Baroda, Benton Harbor, Buchana Burr Oak, Coldwater, Coloma, East Lansing, Ea Claire, Grand Ledge, Hillsdale, Jackson, Kalama zoo, Lansing, Litchfield, Marshall, Mason, Pa Paw, Niles, Plainwell, Potterville, Quincy, S Joseph, Sturgis, Waldron, Addison, Fennville, Te cumseh.

Southeast: Dearborn Heights, Detroit, Drayto Plains, Grosse Pointe Woods, Livonia, Milfor New Haven, Romeo, Royal Oak, Saline, Sumpte Twp. Area, Wayne, Whitmore Lake, Pontia Troy, Ypsilanti.

Medical specialists also are in great demand i Michigan. Fifty-seven Michigan communities no are registered for 128 specialists with the Michiga Health Council's Placement Service. Some co munities need only one additional speciali Other communities are seeking several physicia in the same specialty and/or a wide number o medical specialties.

MHC is working with 27 communities that ar seeking internal medicine specialists, 19 that ar seeking general surgeons and 17 that are seekin pediatricians.

For more information concerning the opening write or phone the Michigan Health Council John A. Doherty, Executive Director; P.O. Bo 431, East Lansing, Michigan 48823; Phone: Are Code 517, ED 7-1615.

UPPER PENINSULA	Anesthe-siology	Dermatology	Ear-Nose-Throat	Internal Medicine	Neuro-surgery	OB-Gyn	Ophthal-mology	Orthodepics & Orthope-dic Surgery	Pathology	Pediatrics	Public Health	Psychiatry Neurology	Radiology	General Surgery	Urology	Industrial Medicine
Calumet																X
Escanaba								X						X	X	
Hancock-Houghton			X					X						X	X	X
Iron Mountain														X		
Marquette		X	X		X						X					
Sault Ste. Marie			X	X		X	X	X		X						
Ishpeming								X								
NORTH CENTRAL																
Alpena				X				X		X				X		
Cadillac														X		
Charlevoix				X										X		
Frankfort														X		
Traverse City											X					
Newberry												X		X		
WEST CENTRAL																
Alma-St. Louis	X			X		X				X				X		
Grand Haven			X	X			X							X	X	
Greenville				X		X								X		
Holland									X							
Ionia												X				
Manistee				X			X									
St. Johns				X												
EAST CENTRAL																
Bad Axe										X						
Bay City														X		
Caro												X				
Durand				X										X		
Flint											X					
Lapeer				X						X	X	X				
Mt. Pleasant			X	X		X								X		
Saginaw											X					
St. Clair				X										X		
Owosso						X				X					X	
SOUTHWEST																
Albion							X									
Allegan										X						
Battle Creek			X									X				
Benton Harbor	X		X							X						
Buchanan										X						
Coldwater				X			X									
Jackson			X	X			X									
Lansing			X	X			X									
Marshall				X						X						
Mason				X			X			X				X		
Paw Paw				X						X				X		
Niles				X			X							X		
Plainwell				X		X				X						
St. Joseph				X								X				
Monroe										X						
Sturgis				X												
SOUTHEAST																
Wayne				X												
Dearborn Heights				X												
Detroit				X		X			X	X	X			X	X	X
Drayton Plains			X				X	X								
Livonia										X						
Madison Heights			X				X			X					X	
Northville												X				
Plymouth										X						
Pontiac				X							X					
Royal Oak				X												
TOTALS	2	1	11	27	1	7	11	6	2	17	8	7	—	19	6	3

Says Many Children Still Unnecessarily Have Measles

BY GEORGE H. AGATE, M.D., PRESIDENT
CONFERENCE OF STATE AND TERRITORIAL EPIDEMIOLGISTS, LANSING

Measles has been until recently a nearly universal childhood disease. Though often regarded by the layman as "a part of growing up," physicians have long recognized the fearful sequellae of otitis, pneumonia, encephalitis and death.

An effective attack upon measles morbidity and mortality in the United States had to await the licensing of the Edmonston B strain of live attenuated measles vaccine in 1963. More recently Schwarz has produced a further attenuated vaccine which current evidence indicates produces lasting immunity with a very low percentage of side effects and without the necessity of simultaneous administration of gamma globulin. A killed virus vaccine is also available for children with special immunologic problems.

The application of currently available vaccines has decreased reported measles incidence to the lowest levels in many years. Although this is a very encouraging trend, many children continue unnecessarily to experience this dangerous disease.

MEASLES CAN and should be eradicated from the United States in the near future. Such a goal is clearly within the realm of possibility, given the complete and dedicated cooperation of private physicians and public health agencies.

The approach to measles eradication on the local level is two-fold. The first step is careful surveillance for susceptibility within the local community. This establishes the age, geographic location, school, and socio-economic status of susceptibles. Continued surveillance, carried out primarily through school systems, will identify potential outbreaks.

The next logical step is wide dissemination of vaccine. To this end, general practitioners and pediatricians must now immunize all susceptible children within their practices. In addition, community-wide campaigns have proved a valuable and feasible method of raising immunization levels. Statewide programs sponsored jointly by the State Medical Society and Health Department have been very successful in Rhode Island and Delaware. In the former state, over 30,000 children were immunized in one day to effectively eliminate measles susceptibility within the state. Follow-up studies revealed no significant difficulty in handling the small number of vaccine reactions even when immunization was carried out on such an ambitious scale as this.

WHEN SURVEILLANCE data indicates epidemic situations, rapid immunization of susceptible populations in the community may terminate the epidemic. This was demonstrated on four occasions during 1965 and 1966 in California, Michigan, Kentucky and New Jersey.

The Association of State and Territorial Epidemiologists, after reviewing current measles morbidity trends and vaccine status, wholeheartedly endorses the concept of eradicating measles in the United States. We urgently recommend the maximum usage of currently available vaccines to effectively achieve this goal within the next nine months.

AMA Urges Efforts To Eliminate Measles

The American Medical Association has called upon physicians and local medical societies to expand efforts to eliminate measles in the United States.

The AMA's Council on Environmental and Public Health stresses that measles prevention is now readily possible through the use of the measles vaccine. More than 12 million children have already received the vaccine since it became available in 1963.

In order to eradicate measles in the foreseeable future, the newly-organized Council recommends the following steps:

1. All children should be immunized when approximately 12 months old.

2. Eventually all measles-susceptible children should be immunized, but the first effort should be to protect infants and those entering kindergarten and the first two grades of elementary school.

3. Older children should be immunized only on an individual basis except where large numbers are susceptible as in isolated geographic areas.

This space reserved for additions to the TUBEX system
TUBEX
THIOMERIN® MERCAPTOMERIN SODIUM
WYCILLIN S-M
WYCILLIN
HYDROMORPHONE 2 mg.
STREPTOMYCIN SULFATE 1 Gm base
FOR DEEP IM USE ONLY
WATER FOR INJECTION USP
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MEPERIDINE 100
SPARINE® HCl
TETANUS ANTITOXIN
BICILLIN®

Only TUBEX offers so complete a line of closed-system injectables, and it's still growing

—no other system is safer

—no other system is more efficient

—no other system offers more convenience

—no other system assures greater patient comfort

TUBEX sterile cartridge-needle units are prefilled with measured doses. Each unit is used once, and discarded. This eliminates danger of cross contamination, as well as problems of sterilization, storage, and measurement. Ultra-sharp, siliconized needles keep patient discomfort to a minimum. No other injectable system is easier to use, easier to store, easier to carry.

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4 New TUBEX® Sterile
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Vitamin B Complex with Vitamin B_{12}
Hydroxocobalamin, 100 mcg./cc.
Hydroxocobalamin, 1000 mcg./cc.
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SERVICE TO MEDICINE

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Sterile Cartridge-Needle Unit
Hypodermic Syringe
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100

Health Careers Mobile Rolls Across State to Reach Youths

BY ALICE SNELGROVE
OF THE MSMS STAFF

The Health Careers Mobile will begin operation as a career recruitment center in February when it opens at Greenfield Village, Dearborn.

High school students are given a special invitation to see the Health Careers Mobile in the hope that some of them will decide to seek a career in a health field.

Converted from the MSMS Healthmobile, which dealt primarily with the history of medicine, the Careers Mobile specializes in recruitment. It will visit shopping centers, schools, and the campuses of major colleges and universities, all in the Michigan area, carrying special programs to interested persons.

OPERATED UNDER the auspices of the Michigan Health Council, which purchased the coach from the Marlette Company, the unit will continue to be staffed by members of the MSMS Woman's Auxiliary along with other personnal specifically chosen for career recruitment. The Medical Society, however, will continue to furnish some materials such as pamphlets and books.

Although the Mobile will retain many of the exhibits dealing with medical history and practice, several new ones will be added. Among these are displays by the Michigan Department of Public Health, Wayne State University, the University of Michigan, Michigan State University, the American Medical Association, and others.

The Mobile will highlight the Michigan Health Council's silver anniversary celebration to be observed in 1967. Its next stop will be at Wayne State University.

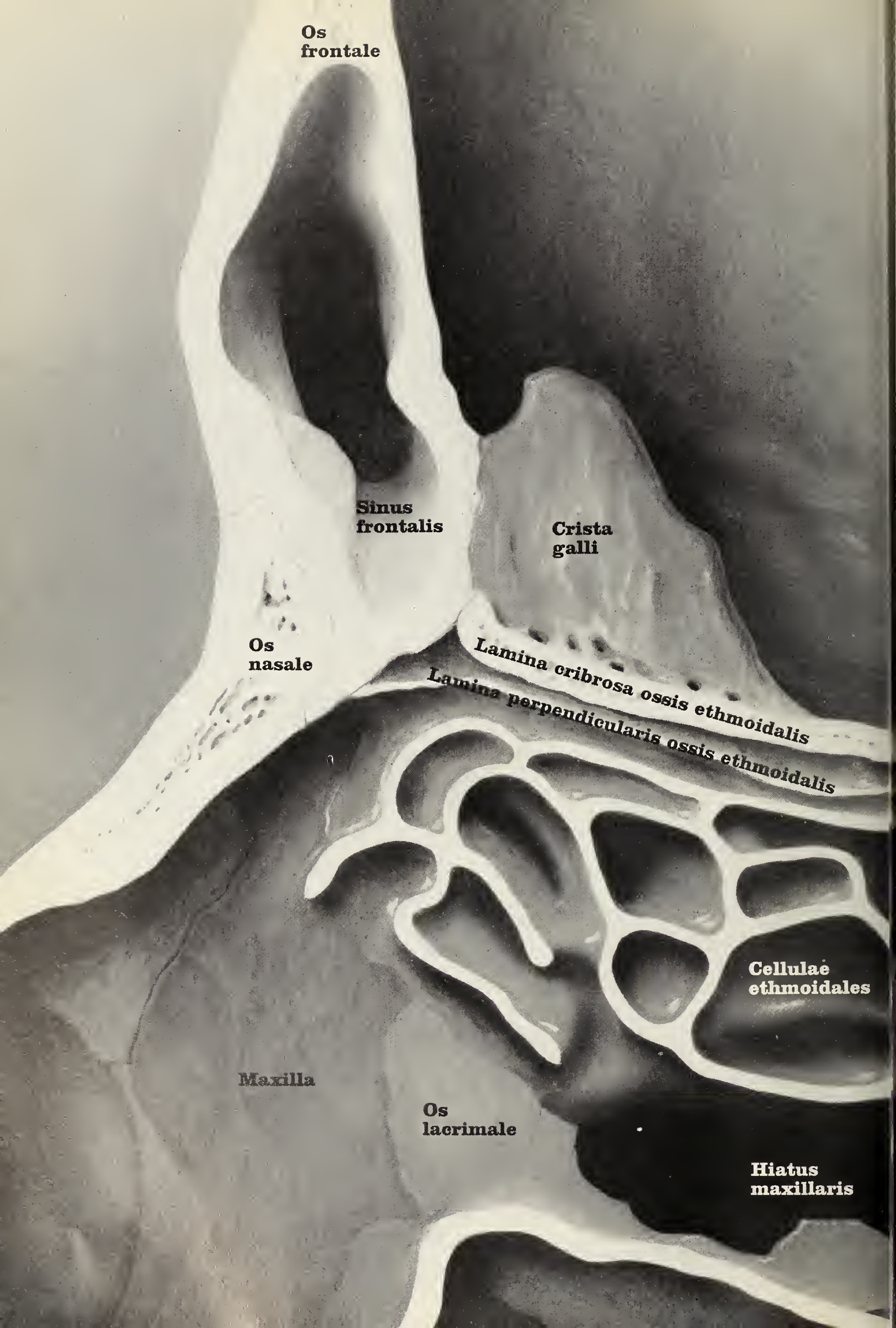
FOR FURTHER information contact: John A. Doherty, Michigan Health Council, Box 431, E. Lansing, or Ralph Wills, Michigan State Medical Society, 120 W. Saginaw, E. Lansing.

Michigan Breakdown by Specialties Reported from AMA Records

The AMA reports the following information about 10,050 licensed physicians in Michigan.

The AMA, in reporting these breakdowns by specialties, adds that "the designation of a specialty is in accordance with the physician's request."

	Total	In Private Practice	Not In Private Practice
Administrative Medicine	95	0	95
Allergy	47	41	6
Anesthesiology	222	175	47
Aviation Medicine	2	1	1
Cardiovascular Disease	60	13	29
Child Psychiatry	44	13	31
Diagnostic Roentgenology	1	1	0
Dermatology	140	85	55
Forensic Pathology	2	0	2
Gastroenterology	8	3	5
General Practice	2324	2208	116
General Surgery	1087	710	377
Internal Medicine	1273	733	540
Neurological Surgery	67	42	25
Neurology	69	16	53
Obstetrics and Gynecology	740	549	191
Occupational Medicine	102	19	83
Ophthalmology	314	240	74
Orthopedic Surgery	215	156	59
Otolaryngology	164	117	47
Pathology	295	73	222
Pediatrics	505	330	175
Pediatric Allergy	2	2	0
Pediatric Cardiology	4	0	4
Phys. Medicine and Rehab.	28	11	17
Plastic Surgery	48	31	17
Gen. Preventative Medicine	21	0	21
Colon and Rectal Surgery	31	29	2
Psychiatry	623	303	320
Public Health	50	0	50
Pulmonary Diseases	39	10	29
Radiology	377	237	140
Thoracic Surgery	71	42	29
Urology	155	120	35
Other	79	22	57
TOTAL	10050	6350	3700


Os frontale
Sinus frontalis
Crista galli
Os nasale
Lamina cribrosa ossis ethmoidalis
Lamina perpendicularis ossis ethmoidalis
Cellulae ethmoidales
Maxilla
Os lacrimale
Hiatus maxillaris

Sinus headache is not a single entity, but a chain reaction of pain. It is facial pain—deep, dull, aching and nonpulsating. It is referred pain—originating in the nose and sinuses but felt at another site. It may become generalized pain and tension in head and neck. It is one or all of these. The Sinutab formula is designed for symptomatic relief of sinus headache. It provides two analgesics to relieve pain and discomfort... an effective oral decongestant to reduce mucosal congestion... and an antihistamine to help control allergic manifestations. *Side Effects:* Epigastric distress, drowsiness, dizziness, insomnia and nervousness. *Precautions:* Instruct patients not to drive or operate machinery if drowsiness occurs. Use with caution in patients with thyroid disease, heart disease, hypertension, diabetes or kidney disease. Excessive dosage or prolonged use may cause kidney damage. *Dosage:* Adults—2 tablets every 4 hours.

special formula for a special problem

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SINUTAB®
for sinus headache

Each tablet contains 150 mg. acetaminophen, 150 mg. phenacetin, 25 mg. phenylpropanolamine HCl, and 22 mg. phenyltoloxamine citrate.

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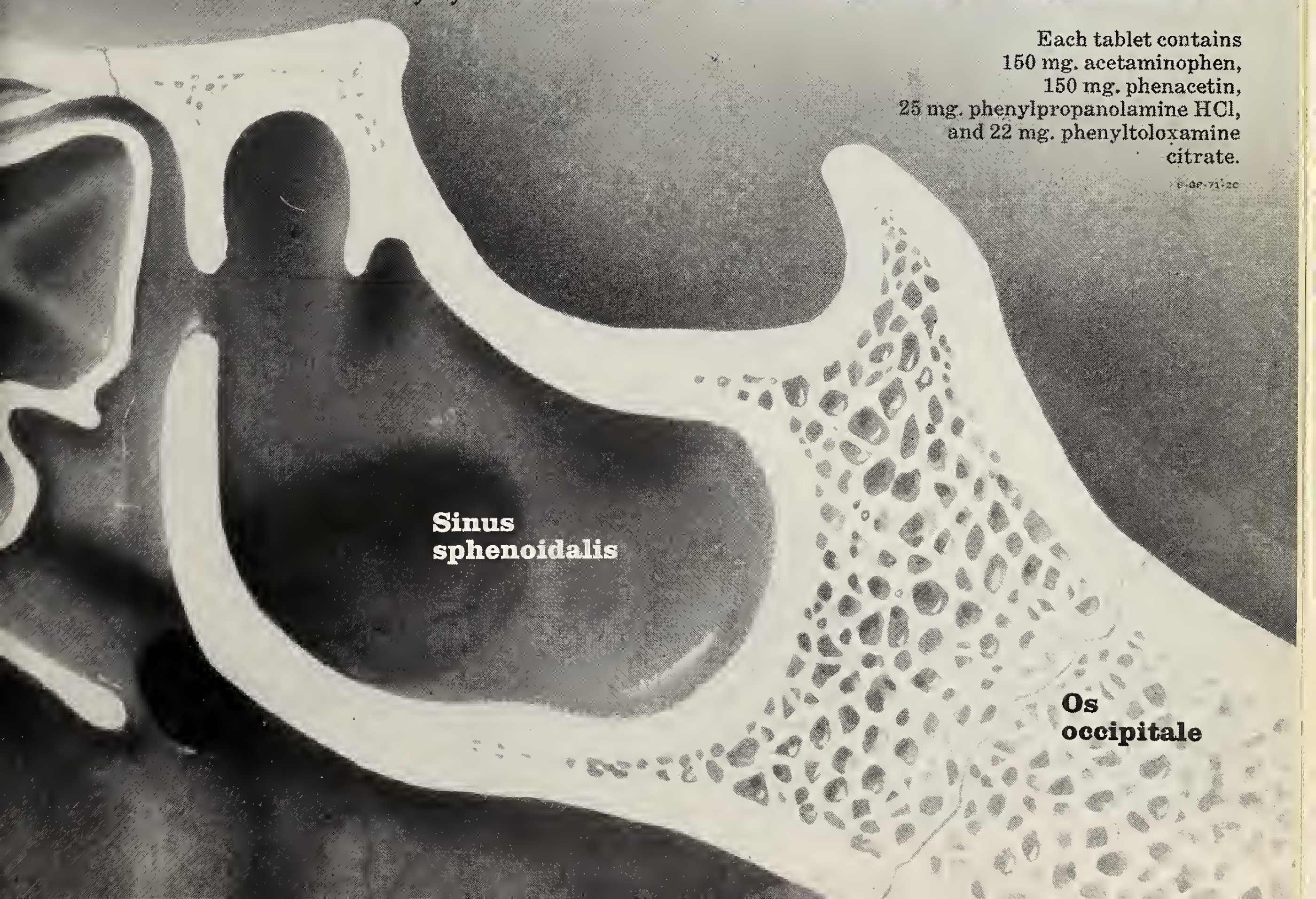

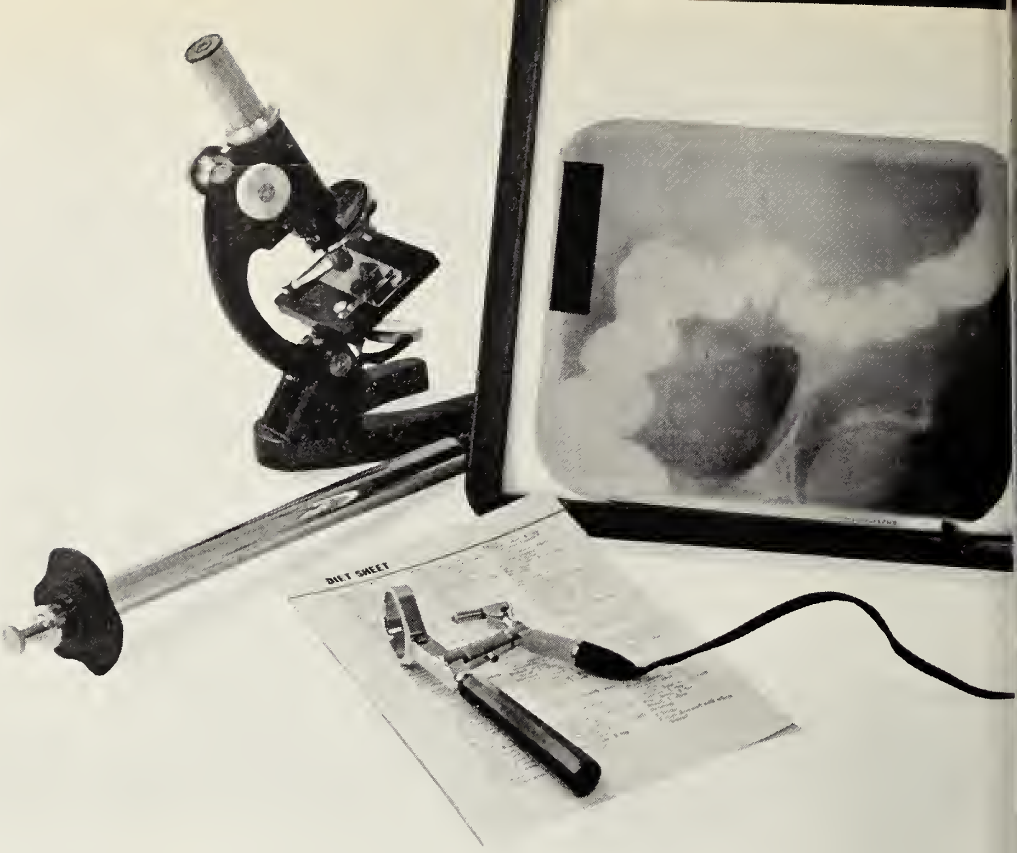

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B and C vitamins aid therapy. Nausea, vomiting, and severe diarrhea may seriously interfere with the digestion and absorption of nutrients. STRESSCAPS capsules, containing therapeutic quantities of vitamins B and C, may help meet the needs of these patients. In digestive disorders, as in many stress conditions, STRESSCAPS vitamins aid therapy.

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Each capsule contains:

Vitamin B_1 (as Thiamine Mononitrate)	10 mg
Vitamin B_2 (Riboflavin)	10 mg
Vitamin B_6 (Pyridoxine HCl)	2 mg
Vitamin B_{12} Crystalline	4 mcgm
Vitamin C (Ascorbic Acid)	300 mg
Niacinamide	100 mg
Calcium Pantothenate	20 mg

Recommended intake: Adults, 1 capsule daily, for the treatment of vitamin deficiencies. Supplied in decorative "reminder" jars of 30 and 100; bottles of 500.

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STRESSCAPS

Forecasts Michigan Changes In Rural Family Life

(Editor's Note: Michigan physicians, especially those in rural and suburban communities, will be interested in the Michigan State University Agricultural Experiment Station and Cooperative Extension Service "Research Report about Home and Family." The following comments are excerpted from the article about "Rural Family Living in Michigan — Now and in 1980" by Barbara Ferrar and Judith Prochnow. Interested MSMS members may obtain a copy of the Report from the MSU College of Agriculture, East Lansing).

The Rural Family, just as the rural economy, will be making a number of adjustments in the next 15 years. To determine what these adjustments will be, a study of past trends is helpful. Even more basic is the need to identify just who are rural Michigan's families and determine what they are like.

Rural families, by the Census definition, are those living either in open country or in towns of fewer than 2,500 residents (but not in the urban fringe). They may be living on a farm or have a rural non-farm home.

In 1960, the rural population was 26.6 per cent of the state's total population. However, farm people comprised only one-fifth of the total rural population. Most of these were in Southern Michigan. Of the rural people living in Northern Michigan about one-third lived in the Upper Peninsula and two-thirds in the Northern Lower Peninsula. The ratio of rural nonfarm to farm was 7:1 in the U.P. and 3:1 in the Northern Lower Peninsula.

THE PICTURE SHOULD change by 1980. The rural population is expected to increase somewhat less rapidly than the total population, reaching 2,565,000 by 1980. Although this is a 23 per cent increase over 1960, the gain is expected to be almost entirely in the nonfarm rural families. The rural nonfarm population is expected to increase by 43 per cent, placing 23 per cent of the total Michigan population in that category by 1980. The farm population, 411,000 in 1960, is expected to decline by almost one-half between 1960 and 1980, becoming only 2 per cent of the total state population compared with 5.6 in 1960.

Some changes in the labor force are anticipated. Today's girls may expect to spend 25 or more years in work outside the home during their lifetimes. This means more working women over 25 years old in 1980. We can also expect decreasing employment levels for men under 25 and over 55. A substantial number of the farmers will have off-farm employment.

Better transportation has brought improvements in health care; and recreational, shopping, and education facilities; in economic opportunities; and in opportunities for social interchange.

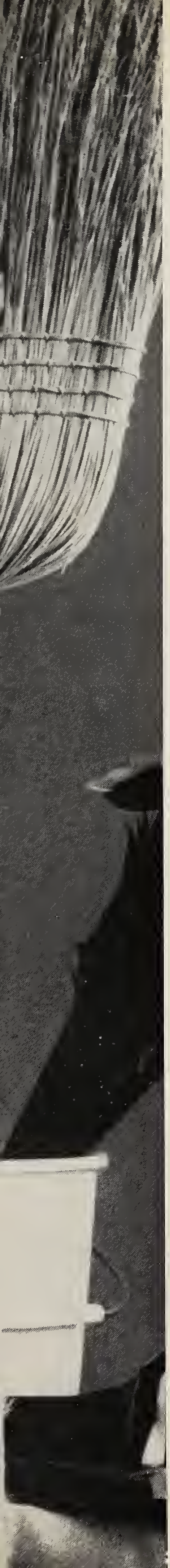
SINCE URBAN MEDICAL facilities have become more accessible, rural families have a better selection of hospital and medical resources from which to choose, except for emergency cases. As of July 1965, all Michigan counties must provide public health services, either by themselves or in cooperation with other countries.

Today nearly all farmers in the United States are within 20 minutes reach of a trade center. In urbanized lower Michigan, practically every rural family is within 60 miles of one or more cities of 50,000 inhabitants.

By 1980 there will be so many automobiles and so much leisure time that suburban shopping centers will lose one of their convenience arguments.

HOUSING FOR FARM and rural non-farm families in Michigan consists largely of one-unit structures. In 1960, 98.4 per cent of occupied farm homes and 96.6 per cent of rural nonfarm homes were one-family structures. However, by 1980 we should see definite trends toward single family houses situated on their own tract of land for rural families only. All others will live in high-rise or medium-rise apartments or in clustered houses with shared park areas. This will be a nationwide trend.

Although swimming pools have been installed in some rural Michigan backyards, it is expected that they will ultimately be banned by law and superseded by community swimming pools, in order to conserve water.



Posed by professional model.

You can't set her free. But you can help her feel less anxious.

You know this woman.

She's anxious, tense, irritable. She's felt this way for months.

Beset by the seemingly insurmountable problems of raising a young family, and confined to the home most of the time, her symptoms reflect a sense of inadequacy and isolation. Your reassurance and guidance may have helped some, but not enough.

SERAX (oxazepam) cannot change her environment, of course. But it can help relieve anxiety, tension, agitation and irritability, thus strengthening her ability to cope with day-to-day problems. Eventually—as she regains confidence and composure—your counsel may be all the support she needs.

> Indicated in anxiety, tension, agitation, irritability, and anxiety associated with depression.
>
> May be used in a broad range of patients, generally with considerable dosage flexibility.

Contraindications: History of previous hypersensitivity to oxazepam. Oxazepam is not indicated in psychoses.

Precautions: Hypotensive reactions are rare, but use with caution where complications could ensue from a fall in blood pressure, especially in the elderly. One patient exhibiting drug dependency by taking a chronic overdose developed upon cessation questionable withdrawal symptoms. Carefully supervise dose and amounts prescribed, especially for patients prone to overdose; excessive prolonged use in susceptible patients (alcoholics, ex-addicts, etc.) may result in dependence or habituation. Reduce dosage gradually after prolonged excessive dosage to avoid possible epileptiform seizures. Caution patients against driving or operating machinery until absence of drowsiness or dizziness is ascertained. Warn patients of possible reduction in alcohol tolerance. Safety for use in pregnancy has not been established.

Not indicated in children under 6 years; absolute dosage for 6 to 12 year-olds not established.

Side Effects: Therapy-interrupting side effects are rare. Transient mild drowsiness is common initially; if persistent, reduce dosage. Dizziness, vertigo and headache have also occurred infrequently; syncope, rarely. Mild paradoxical reactions (excitement, stimulation of affect) are reported in psychiatric patients. Minor diffuse rashes (morbilliform, urticarial and maculopapular) are rare. Nausea, lethargy, edema, slurred speech, tremor and altered libido are rare and generally controllable by dosage reduction. Although rare, leukopenia and hepatic dysfunction including jaundice have been reported during therapy. Periodic blood counts and liver function tests are advised. Ataxia, reported rarely, does not appear related to dose or age.

These side reactions, noted with related compounds, are not yet reported: paradoxical excitation with severe rage reactions, hallucinations, menstrual irregularities, change in EEG pattern, blood dyscrasias (including agranulocytosis), blurred vision, diplopia, incontinence, stupor, disorientation, fever, euphoria and dysmetria.

Availability: Capsules of 10, 15 and 30 mg. oxazepam.

To help you relieve anxiety and tension

Serax®
(oxazepam)

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SERVICE TO MEDICINE

Wyeth Laboratories
Philadelphia, Pa.

Gottlieb Leads Pan-Am Section on Psychiatry

Jacques S. Gottlieb, M.D., Detroit, has been elected by the Board of Trustees of the Pan-American Medical Association to be President of the Section on Psychiatry.

Dr. Gottlieb, director of the Layfayette Clinic, will also serve as special consultant for the 1967 conference in Buenos Aires.

Noted and Quoted:

"No single bond surpasses education in uniting man to man across the boundaries of generations and nations. Educators are bound by the rule of evidence, without geographic locus, an international community whose members are committed as one, yet dispersed.

"By its very nature, the process of international education is a collaborative one. Just as research and education have shaped the nature of our country, they have also been the tools of our international experience. What is meant by knowledge and what men do with it have been expanded.

"Hence, the new hopes for education as the stimulus of mutually beneficial change in the world community."

—Paul A. Miller, Assistant Secretary for Education. Department of Health, Education and Welfare and former MSU professor

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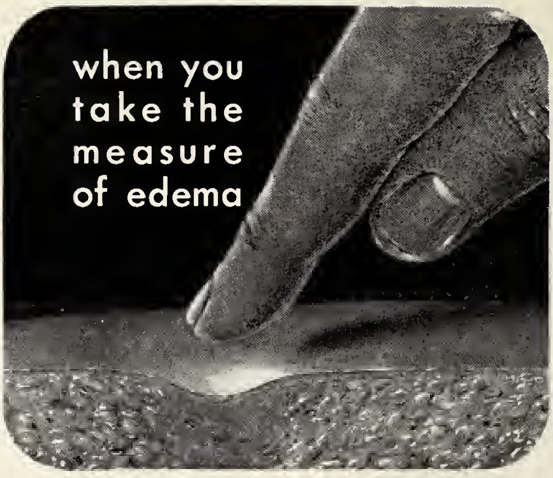
Hypervolemia may follow intravenous administration of excessive volumes of fluid or blood or intravascular absorption of large quantities of irrigating solution from surgically traumatized venous sinuses. The latter may occur during transurethral surgical procedures.

The following prophylactic measures have been recommended to minimize intravascular absorption of significant amounts of irrigating solution: (1) introduction of irrigating fluid under moderate hydrostatic pressure, with the reservoir height not over 28 inches above the bladder; (2) limitation of duration of the procedure to one hour; and (3) avoidance of dissection extending into the deep-lying sinuses.—The Anesthesia Study Committee of the New York State Society of Anesthesiologists, Lester C. Mark, M.D., Chairman: *New York State Journal of Medicine*, 66:979-980.



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AQUATAG®

(BENZTHIAZIDE)

AQUATAG (Benzthiazide) is a potent, orally active, nonmercurial, diuretic agent. It is effective orally in producing diuresis in edema states, where it is therapeutically comparable to mercurials given parenterally. AQUATAG (Benzthiazide) is mildly antihypertensive in its own right and enhances the action of other antihypertensive drugs when used in combination.

DIURETIC ACTION: Clinically, the oral administration of AQUATAG (benzthiazide) results in diuretic activity within two hours with maximal natriuretic, chloruretic, and diuretic effects occurring during the fourth, fifth and sixth hours. Maintenance of response continues for approximately 12 to 18 hours. Acidosis is an unlikely complication since therapeutic doses of AQUATAG (benzthiazide) do not appreciably increase bicarbonate excretion. Edematous patients receiving 50 mg. of AQUATAG (benzthiazide) daily for five days developed a maximal increase in the rate of sodium excretion on the first day, and maintained this high rate until depletion of excessive body stores of sodium.

In congestive heart-failure patients, AQUATAG (benzthiazide) produced the same weight loss, during a 48-hour treatment period as did a maximally effective dose of hydrochlorothiazide.

DOSAGE: Diuresis, initially 50 to 200 mg.; maintenance 25 to 150 mg., daily. Hypertension 50 to 100 mg. initially, adjusted to 50 mg. t.i.d. or downward to minimal effective dosage level.

WARNINGS: Use with caution in the presence of renal disease as azotemia may be precipitated or increased. In patients with advanced hepatic disease, electrolyte imbalance may result in hepatic coma. Dosage of coadministered antihypertensive agents should be reduced by at least 50%. In cases of suspected electrolyte imbalance, serum electrolyte determinations should be performed and imbalance, if any, corrected. Stenosis or ulcer of small intestine have been reported with coated potassium formulas, and surgery has been required and deaths have occurred. Based on surveys of both United States and foreign physicians, incidence of these lesions is low and a causal relationship in man has not been definitely established. Until further experience has been obtained, the use of the drug in pregnant patients should be weighed against possible hazards to the fetus.

CONTRAINDICATIONS: AQUATAG (benzthiazide) is contraindicated in progressive renal disease or dysfunction including increasing oliguria and azotemia. Continued administration of this drug is contraindicated in patients who show no response to its diuretic or antihypertensive properties. Severe hepatic disease is a relative contraindication. (See "Warnings" above.)

PRECAUTIONS AND SIDE EFFECTS: Electrolyte imbalance with hypokalemia (digitalis toxicity may be precipitated), hypochloremic alkalosis and hyponatremia may occur.

Patients with cirrhosis should be observed for impending hepatic coma and hypokalemia. Other reactions may include blood dyscrasias, hyperuricemia and gout, nausea, jaundice, anorexia, vomiting, diarrhea, dizziness, paresthesia, photosensitivity and headache. Hepatic fetor, tremor, confusion and drowsiness are signs of impending pre-coma and coma in patients with cirrhosis. Insulin requirements may be altered in diabetes. AQUATAG (benzthiazide) should be used with caution post-operatively as hypokalemia is not uncommon. Potassium supplementation may be advisable pre- and post-operatively. There have been occasional reports of thrombocytopenia, leukopenia, agranulocytosis, aplastic anemia and precipitation of acute pancreatitis or jaundice.

Before prescribing or administering, read the package insert or file card available on request.

Available as 25 or 50 mg. scored tablets.

Request clinical samples and literature on your letterhead.

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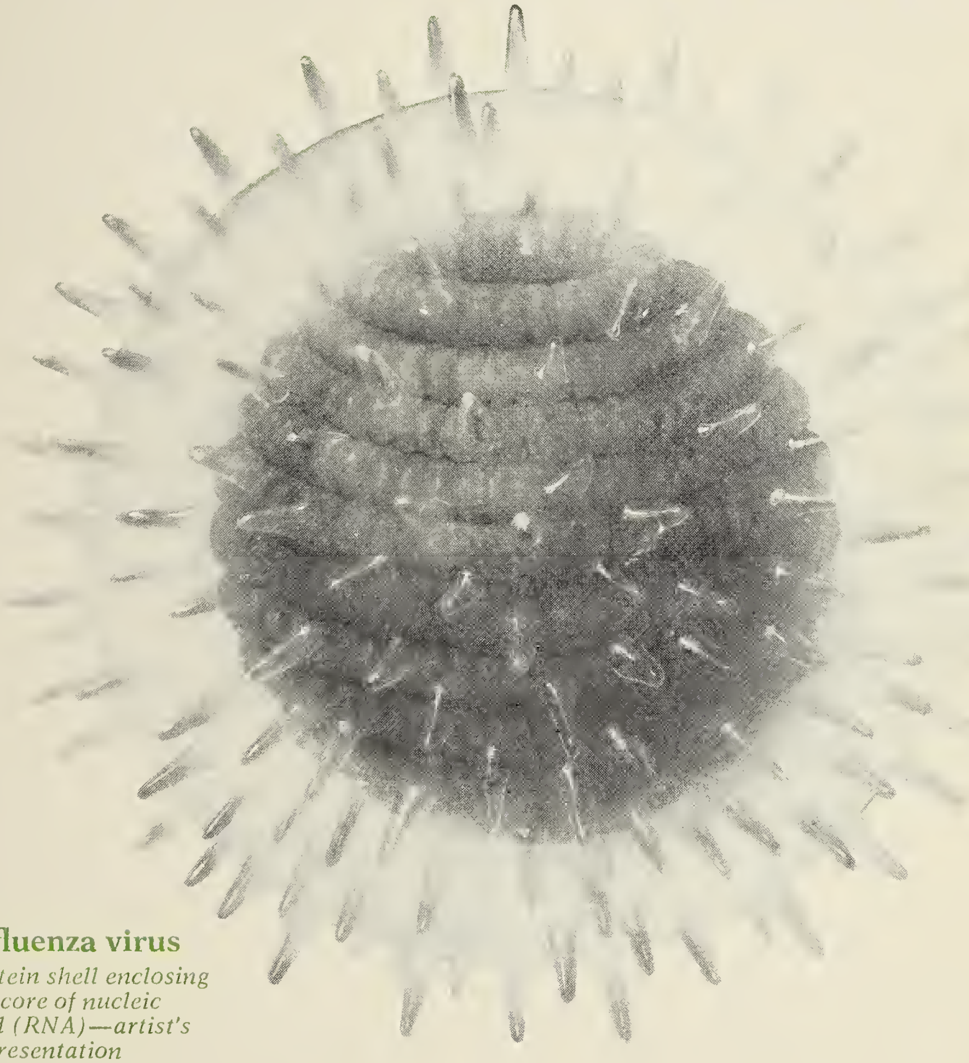
& COMPANY
Detroit, Michigan 48234

New from Du Pont
Symmetrel®
(Amantadine HCl)

he first oral chemical virostat for the prevention of influenza A_2



Influenza virus
Protein shell enclosing the core of nucleic acid (RNA)—artist's representation

The incidence of influenza A_2. In this country, where influenza is one of the leading causes of morbidity, influenza A_2 (Asian) continues to be a serious medical problem. In 1957 influenza A_2 was responsible for approximately 40,000 excess deaths in a three-month period. Since that year the most prevalent influenza virus has been A_2 (Asian).

What is Symmetrel®? "Symmetrel" (amantadine HCl) is a new synthetic chemical which acts as a molecular barrier to virus penetration. It provides for the first time specific oral medication for the prevention of respiratory infections caused by influenza A_2 (Asian) viruses—an entirely new approach in preventive medicine.

For prescribing information, see last page of this presentation

What Symmetrel® (amantadine HCl) means to you

...the first and only oral chemical agent to prevent influenza A_2 (Asian).

...not a vaccine or antibiotic, but a new synthetic chemical unrelated to any other chemotherapeutic agent.

...unique mode of action: prevents virus penetration of the host cell without affecting vital cell functions.

...specifically active against all influenza A_2 viruses tested to date.

...not indicated for the prevention of influenzal or respiratory illness other than influenza A_2 or for the treatment of established disease.

...does not interfere with normal antibody response; acts in concert with pre-existing antibody.

What Symmetrel® means to your patient

...possible immediate influenza A_2 protection when taken following suspected contact.

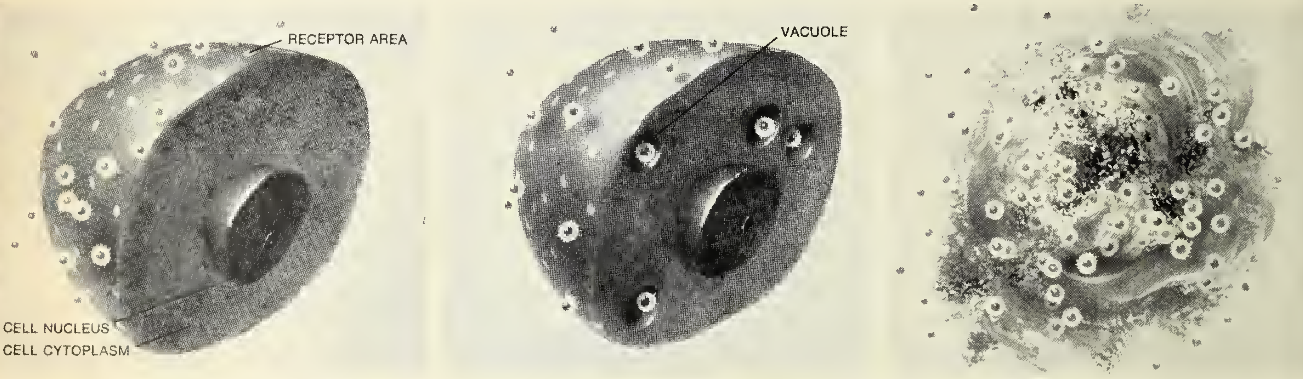
...may be particularly useful during outbreaks or epidemics and for high-risk patients in whom the occurrence of influenza A_2 is especially hazardous.

...a high degree of safety in clinical use.

...simple once daily or b.i.d. dosage.

The mode of action of Symmetrel®

How the influenza virus invades and destroys the untreated cell

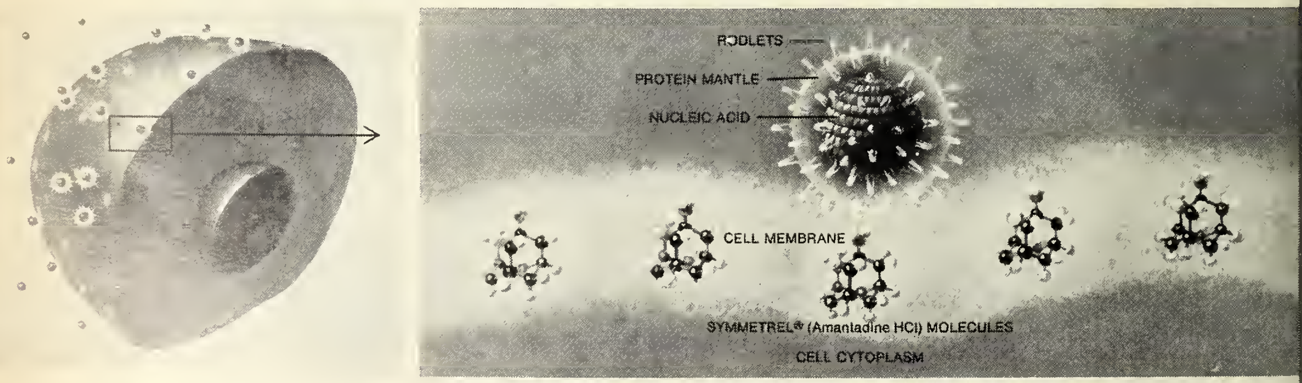


1 Viruses outside the cell attach themselves to specific cell receptor areas

2 The virus is incorporated into a vacuole within the cell. From this vacuole the virus nucleic acid passes into the cell cytoplasm

3 The virus nucleic acid then directs the cell to produce both new virus nucleic acid and virus protein coat material which aggregate to form new virus particles. This process leads to the release of new virus particles and eventual destruction of the cell

How Symmetrel® (Amantadine HCl) prevents virus invasion[1]



Our current knowledge leads us to believe "Symmetrel" acts as a molecular barrier to influenza virus penetration. Shown here in a greatly enlarged section, "Symmetrel"—located at the cellular membrane—effectively prevents (blocks) virus penetration. Thus, "Symmetrel" does not directly destroy the virus particle but acting as a virostat prevents the cycle of virus penetration, virus replication, and cell destruction that is characteristic of virus invasion of animal cells (tissue). *Artist's conception based on current scientific knowledge.*

[1] "Mode of Action of the Antiviral Activity of Amantadine in Tissue Culture", Hoffmann, C. E.; Neumayer, E. M.; Haff, R. F.; and Goldsby, R. A., Journal of Bacteriology 90,623 (1965).

Safety of Symmetrel® Confirmed. When used as indicated, is generally well tolerated. No kidney, liver, bone marrow, or hematological disturbances have been observed.

Prescribing Information

Indications: "Symmetrel" is indicated for the prevention (prophylaxis) of influenza A_2 in persons of all age groups. Early use is recommended, preferably before or as soon as possible after actual or suspected contact with individuals suffering from influenza A_2. "Symmetrel" should especially be considered for high influenza-risk patient groups such as those suffering from chronic debilitating diseases and elderly persons.

Contraindications: Not indicated for the prevention of influenzal or respiratory illness other than influenza A_2 or for the treatment of established disease.

Warnings: Administration to patients with central nervous system disease, particularly geriatric patients with cerebral arteriosclerosis, and patients with a history of epilepsy or other "seizures," requires strict observation for possible untoward effects (see Adverse Reactions). Patients taking psychopharmacologic drugs, central nervous system stimulants, or alcoholic beverages should be observed for possible evidence of intolerance. Those patients who experience central nervous system effects or blurring of vision should be cautioned against driving or working in situations where alertness is important.

No teratogenic effects have been seen in reproductive studies in rats and rabbits. Studies in pregnant women have, however, not been done and use of this drug in women of childbearing age should be undertaken only after weighing the possible risks to the fetus against benefit to the pregnant patient. It should not be administered to nursing mothers since it is not known whether the drug is secreted in the milk.

Precautions: Ineffective against bacterial infections. Patients should be observed for idiosyncratic reactions as with all new drugs. Geriatric patients with pre-existing serious medical illnesses with mental or physical deterioration should be followed carefully medically while taking "Symmetrel." (See Adverse Reactions.)

Adverse Reactions: With higher than indicated doses manifestations of central nervous system effects such as nervousness, insomnia, dizziness, lightheadedness, drunken feeling, slurred speech, ataxia, inability to concentrate and some psychic reactions including depression and feelings of detachment were seen. Occasional blurred vision was reported at higher doses. Some of the milder and less pronounced symptoms above have been reported in a small number of patients taking the recommended dosage of 200 mg per day. Those were mostly transient and disappeared with continued administration of the drug. Some geriatric patients developed paranoid or hallucinatory behavior and became unmanageable while taking 200 mg daily. Medically unselected seriously deteriorated geriatric patients showed poor clinical tolerance after several weeks of daily dosing with 200 mg per day. One elderly patient with a history of prior cerebrovascular accident developed visual hallucinations and grand-mal convulsions while on drug at 800 mg per day. Some cases of dry mouth, gastrointestinal upset and skin rash and rarely, tremors, anorexia, pollakiuria, and nocturia have been also reported.

Safety: When used as indicated, is generally well tolerated. No kidney, liver, bone marrow, or hematological disturbances have been observed.

Dosage: *Adults:* Two 100 mg capsules (or 4 teaspoonfuls of syrup) as a single daily dose or the daily dose may be divided into one capsule of 100 mg (or 2 teaspoonfuls of syrup) twice a day.

Children: 1 yr.—9 yrs. of age: Calculate total daily dose on the basis of 2 mg to 4 mg per pound of body weight per day (but not to exceed 150 mg per day). Daily dose, given as the syrup, should be given in 2 or 3 equal portions.

9 yrs.—12 yrs. of age: Total daily dose 200 mg given as one capsule of 100 mg (or 2 teaspoonfuls of syrup) twice a day.

How Supplied: *Capsules:* Bottles of 100. Each red, gelatin capsule contains 100 mg amantadine HCl.
Syrup: Bottles of 1 pint. Each 5 ml (1 teaspoonful) contains 50 mg amantadine HCl.

DU PONT

Symmetrel®

(Amantadine HCl)

A molecular barrier to virus penetration

arrest diarrhea
in • gastroenteritis • acute infections

R I 32
POLICE

LOMOTIL®

Each tablet and each 5 cc. of liquid contains:
diphenoxylate hydrochloride . . . . 2.5 mg.
(Warning: May be habit forming)
atropine sulfate . . . . 0.025 mg.

Effectiveness: Lomotil possesses a unique degree of effectiveness in both acute and chronic diarrhea.

Convenience: Lomotil is supplied as small, easily carried, easily swallowed tablets and as a pleasant, fruit-flavored liquid.

Versatility: The therapeutic efficiency, safety and convenience of Lomotil may be used to advantage alone or as adjunctive therapy in diarrhea associated with:

- **Ulcerative colitis**
- **Acute infections**
- **Irritable bowel**
- **Regional enteritis**
- **Drug therapy**
- **Food Poisoning**
- **Functional hypermotility**
- **Malabsorption syndrome**
- **Ileostomy**
- **Gastroenteritis and colitis**

Dosage: For correct therapeutic effect—Rx correct therapeutic dosage. The recommended initial daily dosages, given in divided doses, until diarrhea is controlled, are:

Children: Age	Total Daily Lomotil Dosage	Lomotil Liquid Dosage (Each teaspoonful [4 cc.] contains 2 mg. of diphenoxylate HCl)
3-6 months	3 mg.	½ tsp. 3 times daily
6-12 months	4 mg.	½ tsp. 4 times daily
1-2 years	5 mg.	½ tsp. 5 times daily
2-5 years	6 mg.	1 tsp. 3 times daily
5-8 years	8 mg.	1 tsp. 4 times daily
8-12 years	10 mg.	1 tsp. 5 times daily

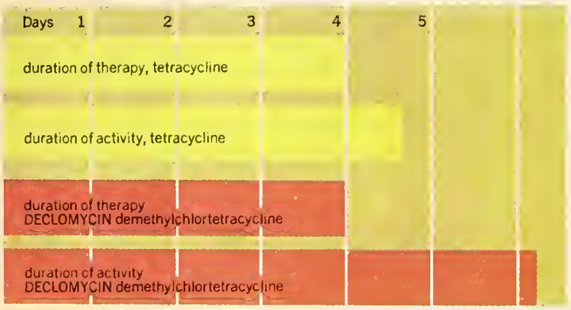
Adults: 20 mg. (2 tsp. 5 times daily or 2 tablets 4 times daily) Based on 4 cc. per teaspoonful. Maintenance dosage may be as low as one-fourth the initial daily dose.

Precautions: Lomotil, brand of diphenoxylate hydrochloride with atropine sulfate, is a Federally exempt narcotic preparation of very low addictive potential. Recommended dosages should not be exceeded. Lomotil should be kept out of reach of children since accidental overdosage may cause severe respiratory depression. Lomotil should be used with caution in patients with impaired liver function and in patients taking addicting drugs or barbiturates. The subtherapeutic amount of atropine is added to discourage deliberate overdosage.

Side Effects: Side effects are relatively uncommon but among those reported are gastrointestinal irritation, sedation, dizziness, cutaneous manifestations, restlessness, insomnia, numbness of extremities, headache, blurring of vision, swelling of the gums, euphoria, depression and general malaise.

SEARLE *Research in the Service of Medicine*

why wonder about a drug when you know DECLOMYCIN® DEMETHYLCHLORTETRACYCLINE produces 1-2 "extra" days' activity



1-2 "extra" days' activity
after the last dose to protect against relapse

one 300 mg tablet b.i.d.
or
one 150 mg capsule q.i.d.

Effective in a wide range of everyday infections — respiratory, urinary tract and others — in the young and aged — the acutely or chronically ill — when the offending organisms are tetracycline-sensitive.

Contraindication — History of hypersensitivity to demethylchlortetracycline.

Warning — In renal impairment, usual doses may lead to excessive systemic accumulation and liver toxicity. Under such conditions, lower than usual doses are indicated and, if therapy is prolonged, serum level determinations may be advisable. A photodynamic reaction to natural or artificial sunlight has been observed. Small amounts of drug and short exposure may produce an exaggerated sunburn reaction which may range from erythema to severe skin manifestations. In a smaller proportion, photoallergic reactions have been reported. Patients should avoid direct exposure to sunlight and discontinue drug at the first evidence of skin discomfort.

Precautions and Side Effects — Overgrowth of nonsusceptible organisms may occur. Constant observation is essential. If new infections appear, appropriate measures should be taken. Use of demethylchlortetracycline during tooth development (last trimester of pregnancy, neonatal period and early childhood) may cause discoloration of the teeth (yellow-grey-brownish). This effect occurs mostly during long-term use but has also been observed in short treatment courses. In infants, increased intracranial pressure with bulging fontanels has been observed. All signs and symptoms have disappeared rapidly upon cessation of treatment. Side reactions include glossitis, stomatitis, proctitis, nausea, diarrhea, vaginitis and dermatitis. If adverse reaction or idiosyncrasy occurs, discontinue medication and institute appropriate therapy. Anaphylactoid reactions have been reported.

Average Adult Daily Dosage: 150 mg q.i.d. or 300 mg b.i.d. Should be given 1 hour before or 2 hours after meals, since absorption is impaired by the concomitant administration of high calcium content drugs, foods and some dairy products.

Capsules: 150 mg; *Tablets:* film coated, 300 mg, 150 mg, and 75 mg of demethylchlortetracycline HCl.

LEDERLE LABORATORIES, A Division of American Cyanamid Company, Pearl River, New York
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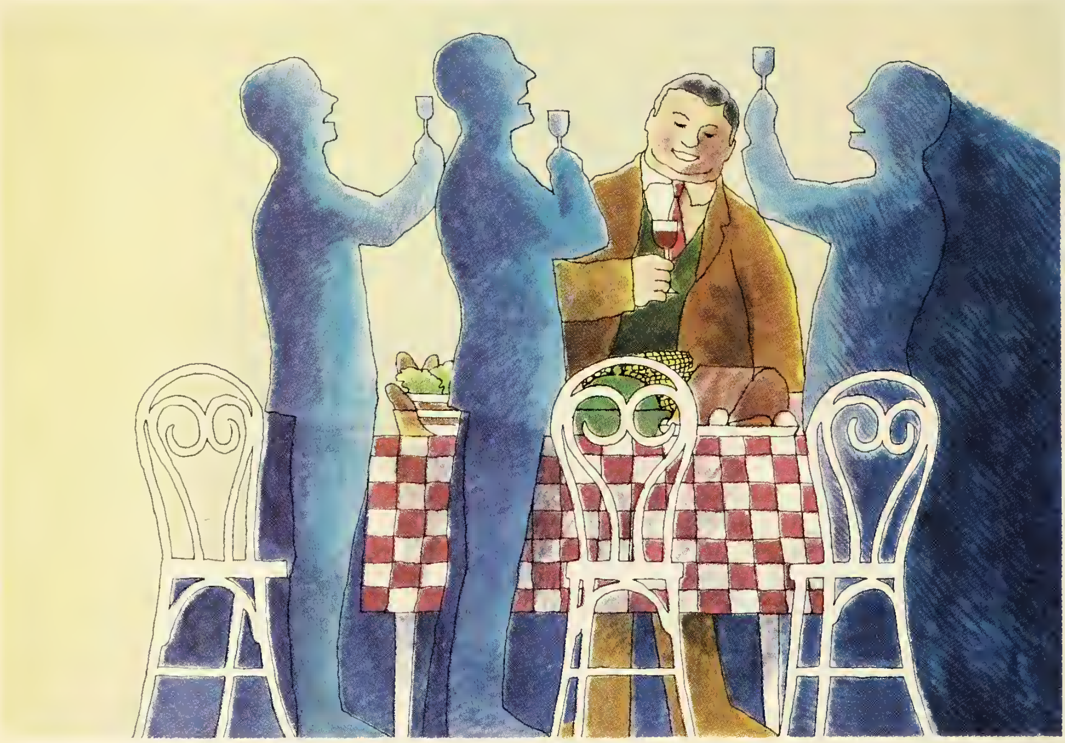
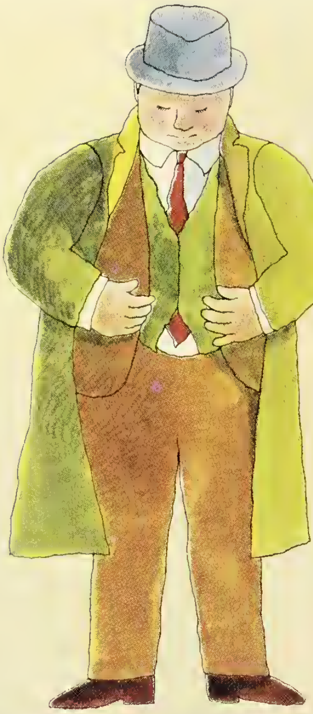
Lederle

For he's a jolly good fellow



But what does he think?



Many overweight patients can benefit from the appetite control provided by the sustained anorexigenic-tranquilizing action of BAMADEX SEQUELS: anorexigenic action of amphetamine; tranquilizing action of meprobamate; prolonged action through sustained release of active ingredients.

Bamadex® Sequels®

DEXTRO-AMPHETAMINE SULFATE (15 mg.) SUSTAINED RELEASE CAPSULES
WITH MEPROBAMATE (300 mg.)

to help establish a new dietary pattern

Contraindications: Dextro-amphetamine sulfate: in hyperexcitability and in agitated prepsychotic states. Previous allergic or idiosyncratic reactions to meprobamate.

Precautions: Use with caution in patients hypersensitive to sympathomimetic compounds, who have coronary or cardiovascular disease, or are severely hypertensive.

Dextro-amphetamine sulfate: Excessive use by unstable individuals may result in psychological dependence.

Meprobamate: Careful supervision of dose and amounts prescribed is advised, especially for patients with known propensity for taking excessive quantities of drugs. Excessive and prolonged use in susceptible persons, e.g. alcoholics, former addicts, and other severe psychoneurotics, has been reported to result in dependence on the drug. Where excessive dosage has continued for weeks or months, reduce dosage gradually. Sudden withdrawal may precipitate recurrence of preexisting symptoms such as anxiety, anorexia, or insomnia; or withdrawal reactions such as vomiting, ataxia, tremors, muscle twitching and, rarely, epileptiform seizures. Should meprobamate cause drowsiness or visual disturbances, reduce dosage and avoid operation of motor vehicles, machinery or other activity requiring alertness. Effects of excessive alcohol consumption may be increased by meprobamate. Appropriate caution is recommended with patients prone to excessive drinking. In patients prone to both petit and grand mal epilepsy meprobamate may precipitate grand mal attacks. Prescribe cautiously and in small quantities to patients with suicidal tendencies.

Side Effects: Overstimulation of the central nervous system, jitteriness and insomnia or drowsiness.

Dextro-amphetamine sulfate: Insomnia, excitability, and increased motor activity are common and ordinarily mild side effects. Confusion, anxiety, aggressiveness, increased libido, and hallucinations have also been observed, especially in mentally ill patients. Rebound fatigue and depression may follow central stimulation. Other effects may include dry mouth, anorexia, nausea, vomiting, diarrhea, and increased cardiovascular reactivity.

Meprobamate: Drowsiness may occur and can be associated with ataxia; the symptom can usually be controlled by decreasing the dose, or by concomitant administration of central stimulants. Allergic or idiosyncratic reactions: maculopapular rash, acute nonthrombocytopenic purpura with petechiae, ecchymoses, peripheral edema and fever, transient leukopenia. A case of fatal bullous dermatitis, following administration of meprobamate and prednisolone, has been reported. Hypersensitivity has produced fever, fainting spells, angioneurotic edema, bronchial spasms, hypotensive crises (1 fatal case), anuria, stomatitis, proctitis (1 case), anaphylaxis, agranulocytosis and thrombocytopenic purpura, and a fatal instance of aplastic anemia, but only when other drugs known to elicit these conditions were given concomitantly. Fast EEG activity, usually after excessive dosage. Impairment of visual accommodation. Massive overdosage may produce drowsiness lethargy, stupor, ataxia, coma, shock, vasomotor and respiratory collapse.

LEDERLE LABORATORIES
A Division of American Cyanamid Company,
Pearl River, New York
695-6

PLEASE CLIP AND SAVE:

MDPH Lists Companies Licensed to Produce Biological Products

The Michigan Department of Public Health is frequently asked a number of questions regarding the availability, from various commercial or other sources, of certain biological products for the diagnosis or treatment of disease. To help answer these questions, the following list has been compiled by the Division of Epidemiology based on sources which have been licensed by the National Institutes of Health to produce such products.

This list is for informational purposes only and is not to be taken as a recommendation or endorsement of the products by the Michigan Department of Public Health.

SOURCES OF SUPPLY FOR CERTAIN BIOLOGICAL PRODUCTS

THERAPEUTIC SERA

BOTULISM

Botulism Antitoxin

Types A & B — Lederle Laboratories Division, American Cyanamid Company, Pearl River, New York

Type E — Communicable Disease Center, Atlanta, Georgia, Area Code 404 — 634-2561

— Connaught Medical Research Laboratories, University of Toronto, Toronto, Canada

CHICKENPOX

Chickenpox Immune Serum (Human)
Courtland Laboratories, Los Angeles, California

DYSENTERY

Dysentery Antitoxin, Shiga
Parke Davis & Company, Detroit, Michigan

MEASLES

Measles Immune Serum (Human)
Courtland Laboratories, Los Angeles, California

MEASLES

Measles Immune Globulin (Human)
Parke, Davis & Company, Detroit, Michigan
Lederle Laboratories Division, Pearl River, New York
Eli Lilly & Company, Indianapolis, Indiana
Hyland Laboratories, Los Angeles, California

MUMPS

Mumps Immune Serum (Human)
Michael Reese Research Foundation, Chicago, Illinois
Courtland Laboratories, Los Angeles, California

Antimumps Serum (Human)
Travenol Laboratories, Inc., Morton Grove, Illinois

Mumps Immune Globulin (Human)
Hyland Laboratories, Los Angeles, California
Cutter Laboratories, Berkeley, California

PERTUSSIS

Pertussis Immune Globulin (Human)
Cutter Laboratories, Berkeley, California
Hyland Laboratories, Los Angeles, California

Antipertussis Serum
Wyeth Laboratories, Inc., Marietta, Pennsylvania
Travenol Laboratories, Inc., Morton Grove, Illinois

Pertussis Imune Serum (Human)
Courtland Laboratories, Los Angeles, California

RABIES

Antirabies Serum
Lederle Laboratories Division, American Cyanamid Company, Pearl River, New York

SCARLET FEVER

Scarlet Fever Immune Serum (Human)
Courtland Laboratories, Los Angeles, California

TETANUS

Tetanus Immune Globulin (Human)
Cutter Laboratories, Berkeley, California
Hyland Laboratories, Los Angeles, California
Lederle Laboratories Division, American Cyanamid Company, Pearl River, New York
Bureau of Laboratories, Michigan Department of Public Health, Lansing, Michigan

ANTIVENINS

Black Widow Spider (Latrodectus mactans)
Merck, Sharp and Dohme, Division of Merck & Company Inc., West Point, Pennsylvania

Rattlesnake (Crotalidae) Polyvalent
Wyeth Laboratories, Inc., Marietta, Pennsylvania

Scorpion
Laboratorios Myn, Mexico D. F., Mexico

Antitoxins other than Tetanus for specific therapy in traumatic and surgical infections with gas gangrene and related organisms

POLYVALENT PREPARATIONS

Gas Gangrene Polyvalent Antitoxin
Wyeth Laboratories, Marietta, Pennsylvania
Lederle Laboratories, Pearl River, New York
The National Drug Company, Philadelphia, Pennsylvania

Tetanus and Gas Gangrene Polyvalent Antitoxin
  Parke Davis & Company, Detroit, Michigan
  Wyeth Laboratories, Marietta, Pennsylvania
  Lederle Laboratories, Pearl River, New York
  Eli Lilly & Company, Indianapolis, Indiana
  The National Drug Company, Philadelphia, Pennsylvania
  Pitman-Moore Company, Zionsville, Indiana

UNIVALENT PREPARATIONS

Perfringens Antitoxin
  Parke Davis & Company, Detroit, Michigan
  Lederle Laboratories, Pearl River, New York
  Eli Lilly & Company, Indianapolis, Indiana
  Pitman-Moore Company, Zionsville, Indiana

V. septique Antitoxin
  Parke Davis & Company, Detroit, Michigan
  Lederle Laboratories, Pearl River, New York
  Eli Lilly & Company, Indianapolis, Indiana
  Pitman-Moore Company, Zionsville, Indiana

B. histolyticus Antitoxin
  Lederle Laboratories, Pearl River, New York

B. oedematiens Antitoxin
  Parke Davis & Company, Detroit, Michigan
  Lederle Laboratories, Pearl River, New York

B. sordellii Antitoxin
  Lederle Laboratories, Pearl River, New York

BACTERIAL VACCINES

Cholera
  Parke Davis & Company, Detroit, Michigan
  Merck, Sharp and Dohme, West Point, Pennsylvania
  Wyeth Laboratories, Marietta, Pennsylvania
  Cutter Laboratories, Berkeley, California
  Lederle Laboratories, Pearl River, New York
  Eli Lilly & Company, Indianapolis, Indiana
  The National Drug Company, Philadelphia, Pennsylvania

Plague
  Cutter Laboratories, Berkeley, California

VIRUS AND RICKETTSIAL VACCINES

Equine Encephalomyelitis Vaccine (Eastern)
  Cutter Laboratories, Berkeley, California

Equine Encephalomyelitis Vaccine (Western)
  Cutter Laboratories, Berkeley, California

Mumps
  Lederle Laboratories, Pearl River, New York
  Eli Lilly & Company, Indianapolis, Indiana

Q Fever Vaccine
  Lederle Laboratories, Pearl River, New York

Rocky Mountain Spotted Fever Vaccine
  Lederle Laboratories, Pearl River, New York

Typhus Vaccine
  Merck, Sharp and Dohme, West Point, Pennsylvania
  Eli Lilly & Company, Indianapolis, Indiana
  Pitman-Moore Company, Zionsville, Indiana

Typhus Vaccine (Epidemic)
  Lederle Laboratories, Pearl River, New York
  The National Drug Company, Philadelphia, Pennsylvania

Yellow Fever Vaccine
  The National Drug Company, Philadelphia, Pennsylvania (Obtainable only at authorized vaccination centers)

DIAGNOSTIC SUBSTANCES FOR DERMAL TESTS

Blastomycin
  Parke Davis & Company, Detroit, Michigan

Coccidioidin
  Cutter Laboratories, Berkeley, California

Lymphogranuloma Venereum Antigen
  Lederle Laboratories, Pearl River, New York
  E. R. Squibb & Sons, Division of Olin Mathieson Chemical Corp.
  Biological Laboratories, New Brunswick, New Jersey

Mumps Skin Test Antigen
  Eli Lilly & Company, Indianapolis, Indiana

Scarlet Fever Streptococcus Toxin for Dick Test
  Wyeth Laboratories, Inc., Marietta, Pennsylvania
  The National Drug Company, Philadelphia, Pennsylvania

Tuberculin, Tine Test
  Lederle Laboratories, Pearl River, New York

SOURCE OF LESS COMMONLY USED BIOLOGICAL PRODUCTS

GENERALIZED VACCINIA DUE TO SMALLPOX VACCINATION

Vaccinia Immune Globulin
  National Red Cross:
    American National Red Cross Headquarters
    Washington 6, D.C. Tel. Republic 7-8300, Ext. 543
  Director — James H. Pert, M.D.
    Residence — Chevy Chase, Maryland
    Tel. Oliver 6-8375
  Nearest Michigan Source:
    Irving Schulman, M.D.
    Professor of Pediatrics
    University of Illinois
    840 S. Wood St., Chicago
    Tel. 312/663-7117
    Res. Vernon 50160
  Alternate: Marvin Cornblath, M.D.
    Assoc. Professor of Pediatrics
    University of Illinois
    840 S. Wood St., Chicago
    Tel: 312/663-6714
    Res. Vernon 51774

Suggestions Offered To Help Physicians File Income Tax

(Editor's note: The following excerpts are reprinted with permission from "How to Save Time and Money in Filing Your 1966 Personal Tax Return," copyright 1966, Prentice-Hall, Inc., Englewood Cliffs, N.J.).

Last year's right way might well be this year's wrong way. That's how fast things happen in the tax field. To protect you—and help you save tax—here's a quick rundown on some of the new developments you should know about.

AUTOMATIC DEDUCTION FOR BUSINESS USE OF CAR.—If you use your car for business, there's a simple way to figure the deduction. In lieu of separate deductions for depreciation, oil, gas, insurance and repairs, you can take:

- A flat deduction of 10¢ a mile for the first 15,000 business miles traveled.
- 7¢ a mile for every mile in excess of 15,000.
- A separate deduction for parking fees and tolls incurred in business travel.

This method has been available to self-employeds and unreimbursed employees for the last few years [see ¶ 704]. Now IRS has extended this break to *reimbursed* employees who want to claim a deduction in excess of reimbursements [Rev. Proc. 66-10, IRB 1966-10.]

IMPORTANT: The 10¢-and-7¢ rule is for figuring deductions. It doesn't change the rule that a reimbursed employee can receive up to 15¢ a mile from his employer—and it will be considered "accounted for."

OFFICE-IN-HOME EXPENSES.—Even IRS admits that an employee can sometimes get "office in home" deductions. But it sets down some pretty rough tests: The work has to be done as a condition of his employment and he must regularly use his home as an office. The regular-use test is usually easy to meet. But the stumbling block is the business-requirement test. Now here's some—

GOOD NEWS: The Tax Court has rejected the job-requirement test—and substituted an "appropriate and helpful" test. That is, you'll get the deduction if you regularly use your home as an office and it is appropriate and helpful to the con-

FULL-REACH

Balanced, Effective Ultraviolet Therapy...With the New, Smartly Styled Burdick UV-800

The reflector unit "floats" over the treatment table as the Equipoise Arm is extended with finger-tip ease—offering correct positioning to any treatment situation. Special Alzak finish and configuration of the reflector project the radiation evenly, and a detachable Localizer with 2-inch cone allows uniform focusing of radiation to small treatment areas. The high-intensity, balanced radiation of the UV-800 is rich in both bactericidal and antirachitic rays.

Discover the new efficiency of the UV-800. Its smart styling will add to the dignity of the modern office or department. Call your Burdick dealer, or write us today.

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Telephone: TEmple 2-4444

duct of the business [Bischoff, TC Memo 1966-102].

YEAR-OF-SALE DEPRECIATION.—If a taxpayer sold depreciable property at a gain and also claimed depreciation for the year of sale, IRS knocked out the depreciation deduction. *Reason:* The selling price fixed salvage value and you can't depreciate below salvage value. However, many taxpayers fought the issue.

Finally it got to the Supreme Court, which recently held that depreciation is allowable even if the property in question was sold at a gain during the year. *Reason:* Depreciation elements such as useful life and salvage are estimated when write-offs begin. The mere fact of gain on later sale is not enough to second guess the original estimates [Fribourg Navigation, 17 AFTR 2d 470].

IMPACT: Sellers of real estate will benefit the most. *Reason:* Under Sec. 1250 there's only a mild recapture of depreciation on buildings. On the other hand, recapture on equipment hits all post-61 depreciation—and makes the problem largely academic [see ¶ 439].

DEDUCTION FOR UNSUCCESSFUL CRIMINAL DEFENSE.—There had been a long-standing rule that a deduction was allowed for the defense of a business-connected criminal prosecution only if no conviction resulted. Now the Supreme Court has overturned this strict approach.

The new rule: Deductibility does not depend upon whether the case is civil or criminal or the defense is successful or unsuccessful. In short, the only real requirement is that the case be in some way tied to a trade or business [Tellier, 17 AFTR 2d 633].

NOTE: In *tax fraud* cases, there's no need for a business tie-in.

MEALS DEDUCTIBLE ON SUBSTANTIAL ONE-DAY TRIP.—The Revenue Service has always maintained that meals aren't deductible unless you were away from home "overnight" on a business trip. For the most part, in the past the courts have generally gone along. Now, however, the Tax Court has announced that it will not "slavishly" follow the "overnight" rule.

Instead, the Tax Court has substituted a "substantial time and distance" test. That is, whenever business travel takes you a substantial distance from home and you're away from home a long work day—your meals are deductible. On the facts of the case, a 6 A.M. to 10 P.M. working day and a 140-mile round trip satisfied the substantial time and distance test [Bagley, 46 TC No. 15; see also Hanson, CA-8, 298 F. 2d 391].

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and newest facility for intensive, short-term
treatment of voluntary
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Sidney Bolter, M.D.
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FERNDALE, MICHIGAN Telephone: Area 313 398-3200

Now, now, Mrs. Forsythe, we've never lost a cold patient yet.

When she's experiencing acute discomfort from cold symptoms, it's small wonder the patient becomes distressed about her condition.

She will breathe easier when you prescribe Novahistine LP.

Novahistine LP is a long-acting decongestant that helps restore normal mucus secretion and ciliary activity—physiologic mechanisms which prevent infection of the respiratory tract. A dose of two tablets taken in the morning and repeated in the evening will usually keep air passages clear for 24 hours.

Use cautiously in individuals with severe hypertension, diabetes mellitus, hyperthyroidism or urinary retention. Caution patients who operate machinery or motor vehicles that drowsiness may result.

Each Novahistine LP tablet contains: phenylephrine hydrochloride, 25 mg., and chlorpheniramine maleate, 4 mg.

DOW **PITMAN-MOORE** Division of The Dow Chemical Company, Indianapolis

NOVAHISTINE® LP

For relief of nasal congestion.

Conn to Present '67 Beaumont Lecture

After considering medical educators from the United States and Canada, Jerome W. Conn, M.D., of the University of Michigan Medical Center, has been selected to deliver the 1967 Beaumont lecture sponsored by the Wayne County Medical Society.

On April 3, at the WCMS headquarters, Dr. Conn will describe his work on aldosteronism and hypertension.

Given annually since 1922, the Beaumont lectures have featured many notable physicians. They include F. B. Banting, M.D., (1923), Charles H. Mayo, M.D., (1925), Alfred Blalock, M.D., (1940), Cyrus Sturgis, M.D., (1952), and Frederick Coller, M.D., (1957).

To Research Science News

Relationships of Biomedical Information Services is a Public Health Service project to be researched at Wayne State University under the direction of Vern M. Pings.

The $22,782 grant supports one of seven such projects to help the Public Health Service identify ways in which medical scientists seek information in their own working environments. The project's aim is to determine scientists' information needs, match those needs to a comprehensive range of information services, measure the impact of new information services, and compare the information-gathering patterns of several biomedical disciplines.

Bowman Now Leads Michigan Pathologists

The Michigan Society of Pathologists recently installed Harold E. Bowman, M.D., Grand Rapids, as President of the Society and chose Murray R. Abell, M.D., Ann Arbor, as the President-Elect.

Other officers are Edwin M. Knights, M.D., Detroit, Secretary-Treasurer; and Robert C. Horn, M.D., and John R. McDonald, M.D., both of Detroit, members of the Council.

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Early in 1966, MSMS worked with the AMA to include an eight-page insert of Michigan information in the new AMA Horizons Unlimited career booklet. Now, the Pennsylvania Society has copied the Michigan idea.

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BRAND **THIPHENAMIL HCl**

Minimum dosage 400 mg., q. 4 h. until relief is constant, adjust maintenance dosage.

A therapeutic blood level cannot be obtained with small dosage. Trocinate is metabolized and eliminated in the urine as harmless degradation products—a safety factor. Sixteen years of clinical usage with the absence of untoward effects establishes the safety of Trocinate. The autonomic nervous system is not involved in its prompt action.

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100 mg. and 400 mg.
PINK SUGAR-COATED TABLETS

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winter 1966

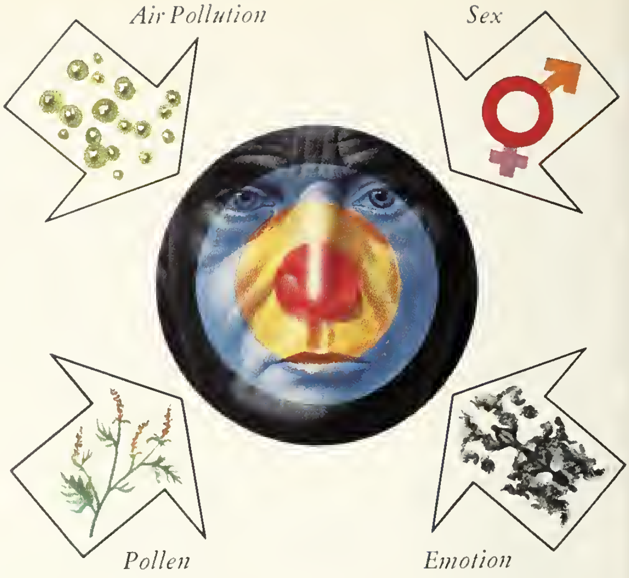
DORSEY Season

A journal within a journal published quarterly in the interests of better medicine by Dorsey Laboratories, a division of The Wander Company, Lincoln, Nebraska. Address communications to Raymond C. Pogge, M.D., Director of Medicine.

this issue: the nose as a shock organ

the nose as a shock organ

by Charles J. Shagoury, M.D., Chelmsford, Massachusetts



"Is it a cold, hay fever, or has he been reprimanded by his boss?" Occasionally, you will ask yourself this question when confronted by a patient with abrupt onset of rhinorrhea, nasal obstruction, and sneezing. Usually the history will elucidate the problem, but examination of the nose will often provide valuable clues to the correct diagnosis.

The nose is a shock organ in a double sense. First, it is in the nose that the confrontation takes place with the surrounding atmosphere. For twenty-four hours a day, the nose must meet the varying challenges of the inspired air, containing perhaps noxious chemicals, dust, dirt, bacteria, viruses, fungi, and industrial pollutants of all kinds, and render it clean, virtually sterile, and fit for the sensitive alveoli of the lungs. Whatever the temperature or humidity of the atmosphere, the nose must transmit it to the lungs at approximately 98°F, and with a humidity of approximately 40%.[1]

Second, in particularly susceptible patients, the nose acts as a shock organ in a manner totally unrelated to its normal function. Persons with hay fever respond to ordinarily harmless materials by extreme nasal congestion, with marked rhinorrhea and violent spasms of sneezing. In some patients, exposure to threatening or disagreeable agents, or situations involving mental conflict may result in a reaction which is exclusively nasal, with swelling of the turbinates, and marked hypersecretion.[2]

Nasal symptoms usually result when the nose seeks to perform its function of getting rid of noxious and dangerous elements in the atmosphere, and prevent their admission to the trachea and lungs. Small particles are removed by the mucous coating which blankets the nasal passages. This mucous blanket contains a bacteriostatic agent, lysozyme, which destroys most air-borne bacteria.[3] The mucinous content renders the surface sticky, causing dusts and small particles to adhere. It has been postulated that this process is rendered more effective through adsorption because of a surface electrical charge on the nasal mucosa.[4] The cilia then sweep the particulate matter to the pharynx. The nose can prevent entrance into the lungs of particles as small as three microns in diameter, but smaller particles elude the nasal barrier. Most bacteria causing respiratory infections are one to three microns in diameter, but since they usually are inhaled in clumps, they are efficiently removed as a rule. Viruses, which are of the order of 1/1000 of this size, are less efficiently dealt with, unless they occur in very large aggregates.[5]

The nose will react in a more or less similar manner, whatever the nature of the offending agent, whether it be an irritant chemical, virus, pollen, or distasteful emotional situation. In acute coryza, the most characteristic sign is a profuse watery discharge. The volume of secretion may rise from practically nothing to nearly 60cc in twenty-four hours.[6] The mucous membrane is reddened and engorged, while the turbinates are markedly swollen. After the first day or two, the secretion becomes thicker, yellowish, and more difficult to expel. The surface cells are largely destroyed, contributing to the copious discharge, which now also contains numerous inflammatory cells which have migrated to the area. Gradually, over a period of a few days, or a week, the flood abates, the swelling and redness subside, and the nasal epithelium resumes a healthy appearance.

Repeated attacks of rhinitis, particularly if there is an underlying element of obstruction, may result in chronic rhinitis. The mucous membrane is constantly swollen and reddened. Sticky, mucopurulent secretions are a continuous feature, and the glandular elements are hypertrophied. Commonly, the mucosal surface takes on an irregular, rounded "mulberry" appearance, and nasal passages are occluded by the swollen turbinates and redundant mucosa.

While all of us are susceptible to colds, the victim of hay fever, or allergic rhinitis, displays a marked nasal reaction to materials in the air which leave his associates unaffected. In such a patient, the nasal mucosa has become an allergic "shock" organ. Contact with the nasal allergen causes local release of histamine, with vasodilatation, increased vascular permeability, and severe nasal congestion, similar to the "wheal" and "flare" reactions in the skin, when the epidermis is the allergic shock organ. While we eagerly await the coming of spring, the hay fever sufferer dreads the blooming season, whose invisible pollens are poisons to his sensitive nose. His neighbor's cat or dog may provoke paroxysms of uncontrollable sneezing. In some cases a specific allergen is not identified, but the triad of rhinorrhea, nasal obstruction, and sneezing is present.[7] The nose in these cases shows a pale, boggy, edematous mucosa, with a thin mucoid secretion. The mucous membrane shows extreme retractility to 1% cocaine or ephedrine. If the patient has medicated himself prior to examination, the nasal passages may appear abnormally patent, or show exaggerated congestion due to rebound reaction. The secretion may show a large number of eosinophils particularly after an attack of sneezing or rhinorrhea. Touching the mucosal surface, especially of the inferior turbinate, leaves an indentation, showing that the swelling is due to stasis and edema, rather than actual hyperplasia of the mucous membrane as in chronic hypertrophic rhinitis. Though the pale swollen mucosa is the hallmark of allergic rhinitis, as usually seen by the physician, exposure of allergic subjects to their known allergens results in a brief hyperemic phase, followed by pallor and edema.[8]

In the later stages of allergic rhinitis, the chronic edema of the mucous membrane results in the formation of polyps, clusters of grape-like masses hanging from the roof of the nose, with a pale glistening surface, contributing significantly to the sense of nasal obstruction and oppression.

A large group of patients show symptoms of nasal congestion when confronted by adverse life situations.[9] In these unfortunate persons, anxiety, frustration, and resentment are often accompanied by a runny nose and nasal obstruction. Lacrimation adds to the nasal stuffiness. This autonomic response, mediated by the parasympathetic nervous system, may be part of a general parasympathetic reaction, or may possibly represent in part, a symbolic effort to wash out and crowd out the offending situation. Nasal congestion may also occur in some patients at times of sexual stimulation, and in women during menstruation and pregnancy, even to the point of epistaxis.[10] The relationship is obscure; castration results in atrophy of the nasal glands, and their action is inhibited by the hormones of the hypophysis and the thyroid.[11] The nose may be the shock organ in drug therapy. The nose may also bear the brunt of industrial stress, in those who work in a hot dry atmosphere, or those exposed to acid fumes, or irritating dusts. As the air in our cities is increasingly polluted by exhaust fumes, and industrial irritants, whole urban populations may suffer from chronic nasal and respiratory symptoms.

Of course, nasal reactions are not just infectious, or allergic, or emotional. Particularly in the chronic sufferers, there is an interdependence of all three. Death of a relative, or other psychic shock can pre-

(concluded on following page)

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For postnasal drip, clogged ears and stuffed and runny noses

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keep patients comfortable 'round the clock. 24-hour decongestion on just a single tablet dosed morning, midafternoon and at bedtime. Patients regain senses and can breathe, smell and taste again.

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Side effects: Occasional drowsiness, blurred vision, cardiac palpitations, flushing, dizziness, nervousness or gastrointestinal upsets. Precautions: The patient should be advised not to drive a car or operate dangerous machinery if drowsiness occurs. Use with caution in patients with hypertension, heart disease, diabetes or thyrotoxicosis.

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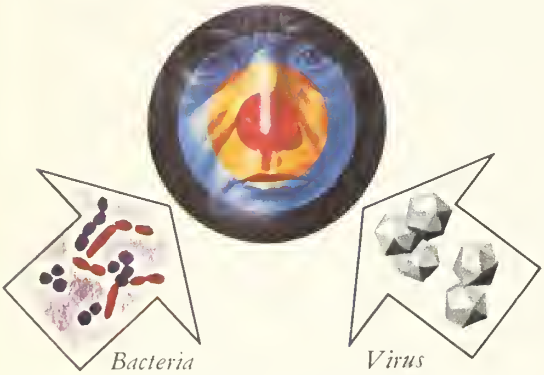
cipitate an attack of rhinorrhea in hay fever sufferers.[12] Others develop attacks of vasomotor rhinitis following change in temperature, chilling, or exposure to the sun, or simply warm bedclothes.



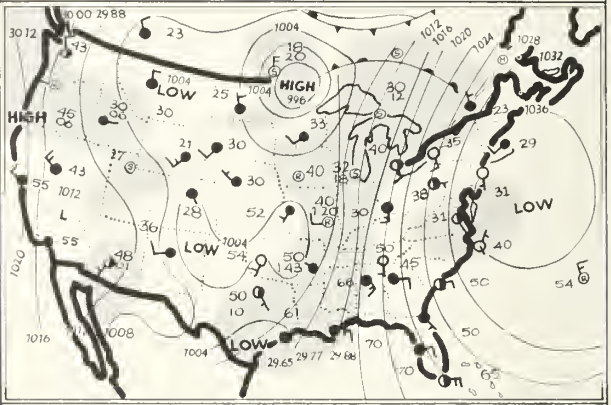
The complex interplay of allergy and infection is largely unclear. Allergy to the viruses and bacteria which cause infection has been postulated, but is difficult to demonstrate. The swollen obstructed allergic nose is more susceptible to infection. At the same time, infection often precedes or precipitates an allergic attack. Exposure of a susceptible patient to an allergen can activate latent virus organisms leading to infection.[13] This "jolt" reaction represents a summation of an allergen and a virus leading to symptoms in the nose as a shock organ, which neither could have produced alone. In childhood, repeated attacks of bronchitis and colds may be inflammatory reactions to an allergen, or precipitated by exposure to an allergen. These children may later develop typical allergic rhinitis. On the other hand, children with typical allergic histories, eczema, asthma, and allergic familial backgrounds, may later develop typical infectious rhinopathies. Skin tests in such patients are usually positive.

Nasal reactions are part of the systemic response of the patient to an unwelcome stimulus. In cases of respiratory infection and exposure to atmospheric irritants, the reactions are useful, and to some extent desirable. They are usually self-limited, disappearing within a few days, or upon removal of the provoking agent. Here the distressing symptoms can be ameliorated with appropriate decongestant agents, or, in the case of severe or complicated respiratory infections, antibiotics may be given, with reasonable confidence of a cure. On the other hand, when nasal reactions are the peculiar response of an individual to an allergen, or to an undesirable situation, they serve no useful purpose. The nose here is a shock organ in a stressful situation, but can furnish no response of value. It merely causes the patient symptoms which add to his problems. In these cases, symptomatic treatment is of great benefit, but often the underlying faulty pattern of response cannot be altered. Such a patient may literally be considered to be paying his way in life "through the nose."

references

1. Maures, E. R., Mendez, F. C., Jr., and Hilsinger, R. C.: Importance of the Nose in Filtering and Humidifying Inspired Air. Ohio State Med. J. 61:41-42. 2. Holmes, T., Goodell H., Wolf, S., and Wolff, H. G.: The Nose. Springfield, Ill. 1950 Charles C. Thomas p. 10 ff. 3. Boies, L. H. R.: Fundamentals of Otolaryngology. Phila. W. B. Saunders Co. 1954 p. 160. 4. Proetz, A. W.: Applied Physiology of the Nose. St. Louis 1941 Zimmerman-Petty Co. p. 6. 5. Spikard, A.: The Common Cold, A Survey. Disease of the Chest 48:545-49. Nov. 1965. 6. Ibid. 7. Bourdial, J.: Role of Allergy in Upper Respiratory Tract Infection. Europa Med. Paris 4:75-80 1965. 8. Holmes, et al. The Nose p. 22. 9. Ibid. p. 320. 10. Proetz, A. W. op. cit. p. 321. 11. Ibid. p. 320. 12. Rees, Linford J.: Physiogenic and Psychogenic Factors in Vasomotor Rhinitis. J. Psychosomatic Research 8:101 Sept. 1964. 13. Horesh, A. J.: Allergy and Infection. An Allergy 23:621-35 Dec. 1965.

Weather Forecast Throughout the Nation



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Challenges Newspapers To Explain Meaning Behind Scientific Gains

"Newspapers must never stop crusading for bet-er communities."

So said Thomas Vail, editor of the Cleveland *lain Dealer,* recently in a speech before the De-roit Ad Club.

In a Newspaper Week speech, Editor Vail chal-enged newspapers "to play an even more decisive nd important role in guiding people to the wisest lecisions."

Editor Vail also declared, "The science and echnology explosion is producing new products, iew markets and new ways of getting around which stagger the imagination."

Mr. Vail asserted that the problem for today's iewspapers is not only to report new things about atellites, pollution, transportation and communi-ation but, more importantly, to point out how ll this will affect the lives of all of us.

"There is no difficulty about bringing all these levelopments to the attention of the public," he continued. "The problem of the newspaper business now is to get across to the public what the meaning of it all is, and how it will affect our daily habits and goals."

AMA Pushes Research

After more than two years of planning and building, the AMA-ERF Institute for Biomedical Research for basic research into life processes was opened in October 1965. Physically, the Institute has space and laboratory equipment in the new AMA headquarters addition, occupying the top three of nine floors. As member scientists are recruited, specific equipment and supplies will be provided to satisfy their research needs.

Plans call for a maximum of 20 to 25 senior scientists, together with associates and technicians. The Institute is designed to provide maximum opportunity for outstanding scientists to devote their full energies to basic research in cellular biology without the distractions of teaching or performing administrative chores. It is supported entirely by private contributions and corporate memberships.

Togetherness....

...can be rough when epidemics of nausea and vomiting strike a family. Emetrol offers prompt, safe relief. It is free from toxicity[1] or side effects[2,3] and will not mask symptoms of serious organic disorders.

1. Bradley, J. E., *et al.*: J. Pediat. *38*:41 (Jan.) 1951.
2. Bradley, J. E.: Mod. Med. *20*:71 (Oct. 15) 1952.
3. Crunden, A. B., Jr., and Davis, W. A.: Am. J. Obst. & Gynec. *65*:311 (Feb.) 1953.

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*Brest, A. N., et al.:J. New Drugs 5:329, 1965.

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Indications: Hypertension and many types of edema involving retention of salt and water. **Contraindications:** Hypersensitivity and most cases of severe renal or hepatic disease. **Warning:** With administration of enteric-coated potassium supplements, the possibility of small bowel lesions should be kept in mind. **Precautions:** Reduce dosage of concomitant antihypertensive agents by at least one-half. Discontinue if the BUN rises or liver dysfunction is aggravated. Electrolyte imbalance and potassium depletion may occur; take special care in cirrhosis or severe ischemic heart disease, and in patients receiving corticosteroids, ACTH, or digitalis. Salt restriction is not recommended. **Side Effects:** Dizziness, weakness, nausea, vomiting, hyperglycemia, hyperuricemia, headache, muscle cramps, postural hypotension, constipation, leukopenia, thrombocytopenia, agranulocytosis, impotence, dysuria, transient myopia, skin reactions, including urticaria and purpura, epigastric pain, or G.I. symptoms after prolonged administration. **Average Dosage:** One tablet (100 mg.) with breakfast daily or every other day. **Availability:** Tablets of 100 mg. in bottles of 100 and 1000. For full details, see the complete prescribing information. 6524-V(B)

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Urges Doctors Do More To Help News Reporters

"Our biggest trouble — in medicine and the news media — is that we really don't know each other," a University of North Carolina Professor of Journalism tells physicians.

"Your public image isn't always good," Professor Kenneth Byerly continues. Byerly's criticism was addressed to a conference of medical men at the North Carolina Memorial Hospital.

The Golden Rule must be followed when dealing with members of the news media. "Papers, magazines, radio, and men and women with news-TV have the same pride, suspicions, ego, hope and desire to serve as people do everywhere," Byerly adds.

The medical profession could enjoy a much more favorable position in the public eye if doctors would do more to improve relations with the press.

"Help the news people with their job as much as possible" he stressed.

The biggest problem newsmen have with professional people is their insistence on technical jargon, Byerly states. Outsiders, those who really need to understand what is being said, cannot comprehend medical terminology. Physicians should avoid using technical language with the general public. Only in that way can they feel assured the public is receiving their message.

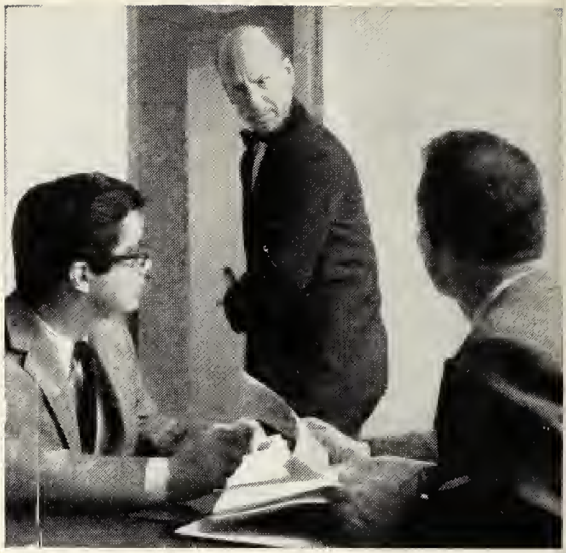
ADVANCED BY PARKE-DAVIS

G. O. Lease, M.D., Ann Arbor, has been appointed to the newly-created position of assistant director, Clinical Investigation Department at Parke, Davis & Company.

Doctor Lease joined Parke-Davis in 1961 as a clinical investigator and a year later was named a medical coordinator for biological research. In 1965 he was promoted to director, clinical therapeutics (international), the position he held until his new assignment.

WORKING WITH COUNTY SCHOOLS

One of the highlights reported by the Oakland County Medical Society during 1966 was the establishment of a Liaison Committee with the Oakland County School System.



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Paregoric (equivalent).........(1.0 dram) 3.7 ml.
Contains opium (¼ grain) 15 mg. per fluid ounce.
warning: may be habit forming
Pectin .... (2½ grains) 162 mg.
Kaolin (specially purified)....(85 grains) 5.5 Gm.
(alcohol 0.69%)
Usual Adult Dose: One or two tablespoonfuls three times daily.

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0 LETTERS A DAY

A recent national survey found that general ractitioners received 3316 pieces of mail in 1966. hat's a drop of 27.3% since 1960. Figuring six orking days a week, that comes to about 10 ieces a day.

The Sad Lot Of a Nurse in 1887:

The following is a job description of a floor urse in a hospital in 1887. It was published in a ecent issue of the magazine of Cleveland Lutheran Hospital, exact date of issue unknown.

In addition to caring for your 50 patients, each urse will follow these regulations:

1. Daily sweep and mop the floors of your ward, ust the patient's furniture and window sills.

2. Maintain an even temperature in your ward y bringing in a scuttle of coal for the day's usiness.

3. Light is important to observe the patient's ondition. Therefore, each day fill kerosene lamps, lean chimneys, and trim wicks. Wash the windows nce a week.

4. The nurse's notes are important in aiding the physician's work. Make your pens carefully, you may whittle nibs to your individual taste.

5. Each nurse on day duty will report every day at 7 a.m. and leave at 8 p.m., except on the Sabbath on which day you will be off from 12 noon to 2 p.m.

6. Graduate nurses in good standing with the director of nurses will be given an evening off each week for courting purposes, or 2 evenings a week if you go regularly to church.

7. Each nurse should lay aside from each pay day a goodly sum of her earnings for her benefits during her declining years, so that she will not become a burden. For example, if you earn $30 a month you should set aside $15.

8. Any nurse who smokes, uses liquor in any form, gets her hair done at a beauty shop, or frequents dance halls will give the director of nurses good reason to suspect her worth, intentions, and integrity.

9. The nurse who performs her labors, serves her patients and doctors faithfully and without fault for a period of 5 years will be given an increase by the hospital administration of 5¢ a day providing there are no hospital debts that are outstanding. — *Public Health News,* Jan. 1965, p. 11, New Jersey State Department Health.

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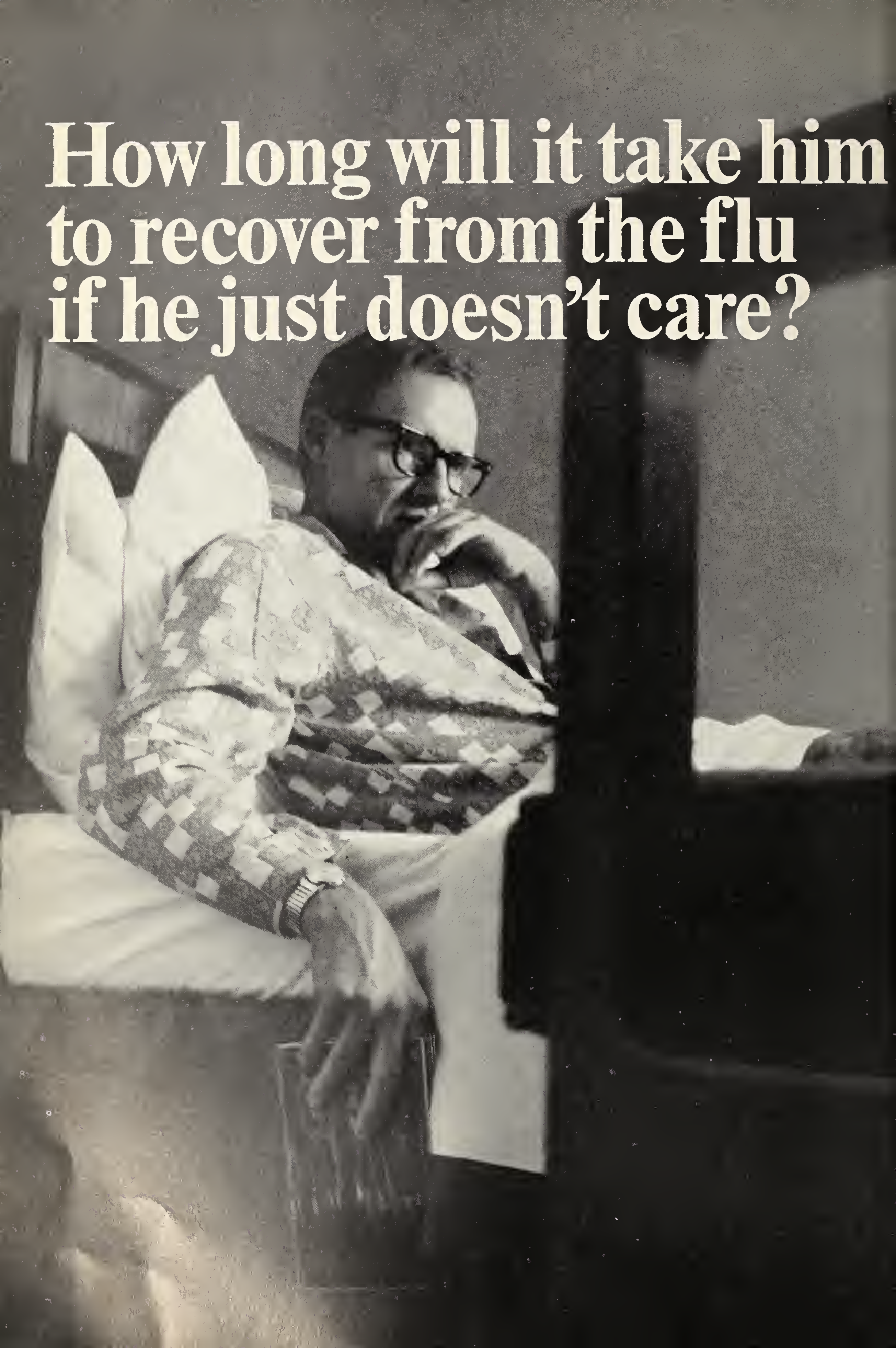

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s he alert, encouraged,
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bout getting out of bed
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Or is he giving in to
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omplicates convalescence,
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*Multiple of adult Minimum Daily Requirement supplied.
†The need for these substances in human nutrition has not been established.

Indications: 1. Functional fatigue such as that often associated with: a depressing life experience or stressful time of life; advancing years; convalescence; limited activity or confinement. 2. Poor appetite and vitamin-mineral deficiency as they occur in: patients having faulty eating habits; geriatric patients who are losing interest in food; patients convalescing from debilitating illness or surgery.

Contraindications: As with other drugs with CNS stimulating action, Alertonic is contraindicated in hyperactive, agitated or severely anxious patients and in chorea or obsessive compulsive states.

Side effects: Reports of overstimulation have been rare. Patients who are known to be unduly sensitive to the effects of stimulant drugs should be observed carefully in the initial stages of treatment.

Dosage: Adults, 1 tablespoonful; children (over 15 years old), 1 to 2 teaspoonfuls; children (4 to 15 years old), 1 teaspoonful. To be taken three times daily 30 minutes before meals.

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book reviews

BIOCHEMISTRY. By K. S. Kleiner and J. M. Orten. Seventh edition. 911 pp. Illustrated. The C. V. Mosby Company, Saint Louis, 1966. $11.50.

The increase in knowledge in the field of biochemistry in the last two to three decades has been so great that it presents a very frustrating problem to an author who is attempting to make a brief survey of the field. Kleiner and Orten have done a very commendable piece of work in bringing about a revision of their text which has obviously fulfilled a need as an elementary text.

It is also difficult for authors in this field to write a book which will be acceptable to freshmen medical students, serve as a good background for the individual who plans to stay within the basic science of biochemistry and earn a graduate degree in that field, and as a reference book for the physician in practice. This text demonstrates very well some of those frustrations. Although the authors have consulted a number of specialists in various fields, as indicated by acknowledgments in the preface, there are still gaps, especially in the clinical application of biochemistry.

The physical make-up of the text is excellent. The main headings and subheadings are clearly indicated by marginal notes. The use of two colors of ink in the preparation of the text also is very beneficial, it helps to clarify formulas and diagrams that are used throughout. A masterful job of condensation has been done as the page size is about average but the total number of pages is anywhere from 100 to 300 less than is found in many of the so-called elementary textbooks in biochemistry. In spite of this, one can find no major omissions in the basic material.

Reviewing the book as a clinician, one can find faults most of which would be common to any of the standard texts in this field. In comparison to other subjects covered it seems to this reviewer that there is an inordinate amount of space given over to basal metabolism. Although the principles of this are important from the standpoint of understanding energy metabolism, the clinical application of this no longer has the value it did some twenty or thirty years ago.

Authors find it difficult to weed out or condense material that was once of considerable importance and was well presented in a previous edition. In the other portions of the clinical material there are many errors or half-truths that reflect the authors' lack of clinical knowledge or ability to interpret the facts in a clinical manner. As an example, in the section on hypertension they state that there is no advantage in eating white meat over red meat. This old fashioned viewpoint has been so long out of date that it hardly seems of value to mention it in a modern discussion of the subject. These sections on clinical material reflect the growing dichotomy between the basic sciences and the clinical sciences.

A few omissions which were noted was the lack of discussion of the hormone calcitonin whose existence has been established for some seven or eight years. Relative to diseases of the thyroid, no mention is made of LATS. These are minor criticisms but it does seem that in a book which purports to be up to date, they should be included. I am sure other examples could be given.

The criticisms of this text are meant to be constructive for this is certainly one of the best in the field and should be continued. One of its greatest merits is the ability of the authors to express themselves clearly. It is concise and the basic material is very much up-to-date. It is a textbook which can be highly recommended to the clinician for a review of general biochemistry. His own knowledge of the clinical material will probably be superior to that of the authors.

—George H. Lowrey, M.D.

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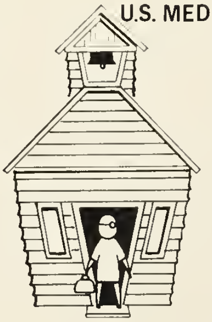

YEAR	U.S. MEDICAL SCHOOLS	GRADUATES
1930	77	4,735
1965	88	7,409
1970	101	8,000
1975	107-113	10,000

when congestion is complicated by sulfa-susceptible bacterial invaders in the upper respiratory tract...

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Each tablet contains: Triaminic® 25 mg. (phenylpropanolamine hydrochloride 12.5 mg., pheniramine maleate 6.25 mg., pyrilamine maleate 6.25 mg.); Trisulfapyrimidines, U.S.P. 0.5 Gm. (sulfadiazine 0.167 Gm., sulfamerazine 0.167 Gm., sulfamethazine 0.167 Gm.)

PHARMACOLOGY: Triaminic decongests and promotes drainage of nasal and paranasal passages, and prevents any further histamine-induced damage; the triple sulfonamides inhibit susceptible bacterial invaders. INDICATIONS: For congestion and infection of the upper respiratory tract caused by sulfa-susceptible organisms. DOSAGE: Adults: 2 to 4 tablets initially, followed by 2 tablets every 6 hours. Medication should be continued until patient has been afebrile for 3 days. ADVANTAGES: The advantages of Trisulfaminic in upper respiratory infections are: freedom from narcotics or alcohol; therapeutic reliability; safety; economy; ease of administration; freedom from potential sensitization to broad-spectrum antibiotics which may be reserved for lower respiratory or other infections caused by susceptible organisms. CONTRAINDICATIONS: Contraindicated in sulfonamide and antihistamine sensitivity, impaired renal function, pregnancy approaching term, and in premature infants and newborn infants during the first month of life. Do not use in patients with glaucoma, prostatic hypertrophy, stenosing peptic ulcer, pyloroduodenal or bladder neck obstruction. WARNING: Use only after careful evaluation in patients with liver or renal damage, urinary obstruction, or blood dyscrasias. Deaths have been reported from hypersensitivity reactions with administration of sulfonamides. In intermittent or prolonged therapy, blood counts and liver and kidney function tests should be performed periodically. Sulfonamide therapy may potentiate the hypoglycemic action of sulfonylureas. PRECAUTIONS: Use with caution in patients with histories of significant allergy or asthma. Assure an adequate fluid intake. Because the antihistamines may cause drowsiness of varying degree, warn patients about activities requiring alertness such as driving a car or operating dangerous machinery. Use with caution in the presence of hypertension, hyperthyroidism, cardiovascular disease and diabetes. ADVERSE REACTIONS: As in all sulfonamide therapy, the following reactions may occur: headache, nausea, vomiting, diarrhea, icterus, hepatitis, pancreatitis, urticaria, rash, fever, cyanosis, hematuria, crystalluria, proteinuria, blood dyscrasias, petechiae, purpura, neuropathy and injection of the conjunctiva and sclera. If one or more of these reactions occur, the drug should be discontinued. With antihistaminic therapy there have been reports of sedation varying from mild drowsiness to deep sleep, dizziness, lassitude, inability to concentrate, fatigue, incoordination, tinnitus, blurred vision, diplopia, euphoria, nervousness, insomnia, tremors, palpitation, hypotension, headache, chest tightness, urinary frequency, dysuria, tingling of the hands, dryness of the mouth, throat, and nose, gastrointestinal disturbances such as epigastric distress, anorexia, nausea, vomiting, constipation and diarrhea and very rarely, leukopenia and agranulocytosis. Adverse reactions reported with the use of sympathomimetic amines include anxiety, tension, restlessness, nervousness, tremor, weakness, insomnia, headache, palpitation, tachycardia, angina, elevation of blood pressure, sweating, mydriasis, anorexia, nausea, vomiting, dizziness, constipation, and dysuria due to vesicle sphincter spasm. PACKAGE INFORMATION: Trisulfaminic Tablets: Supplied in bottles of 100 tablets. CAUTION: Federal law prohibits dispensing without prescription.

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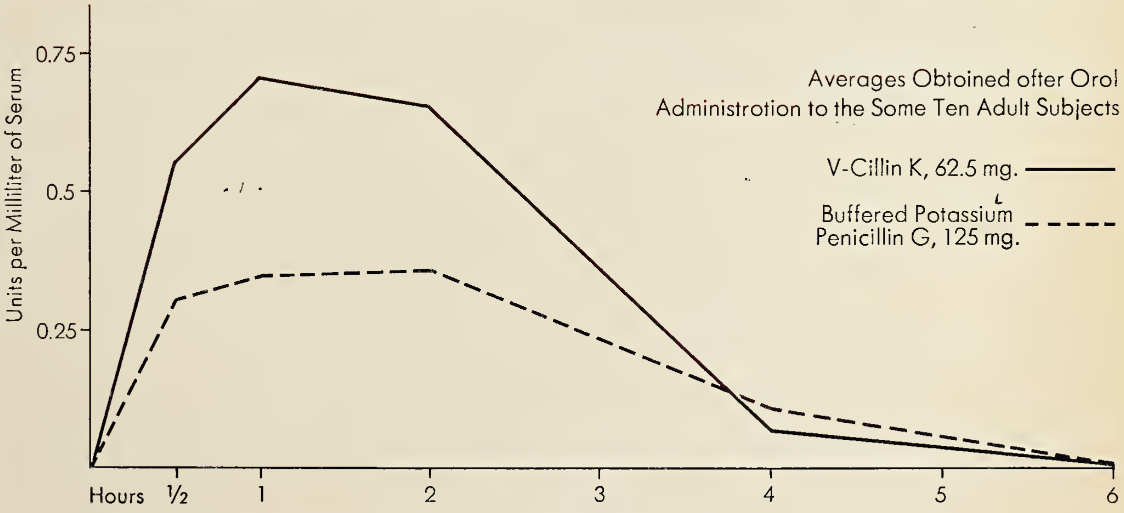
Antibiotic	Staph. Aureus (Penicillin-Sensitive) MIC (mcg./ml.) Median	Staph. Aureus (Penicillin-Sensitive) MIC (mcg./ml.) Range	Streptococcus, Group A MIC (mcg./ml.) Median	Streptococcus, Group A MIC (mcg./ml.) Range	Diplococcus Pneumoniae MIC (mcg./ml.) Median	Diplococcus Pneumoniae MIC (mcg./ml.) Range
Penicillin V	0.02	0.02-0.04	0.02	0.003-0.4	0.01	0.005-0.2
Penicillin G	0.02	0.005-1.6	0.005	0.002-0.2	0.02	0.01-0.1
Methicillin	1.6	0.4-6.3	0.2	0.1-0.4	0.2	0.1-1.6
Oxacillin	0.4	0.1-3.1	0.04	0.02-0.4	0.1	0.04-0.8
Cloxacillin	0.2	0.2-0.8	0.1	0.1-0.8	–	–
Nafcillin	0.4	0.2-0.8	0.04	0.02-0.1	0.02	0.02-0.2
Ampicillin	0.2	0.1-0.8	0.02	0.01-0.04	0.02	0.01-0.04

Adapted from Klein, J. O., and Finland, M.: New England J. Med., 269 1019, 1963.

with high blood levels, even in the presence of food



Adapted from Griffith, R. S., and Black, H. R.: Current Ther. Res., 6 253, 1964.

V-Cillin K® Lilly 700157

Potassium Phenoxymethyl Penicillin

(See next page for prescribing informatio

New 500 mg. tablets...a more convenient way to give high doses

100
TABLETS No. 1832
V-CILLIN K
POTASSIUM PHENOXYMETHYL PENICILLIN TABLETS, U.S.P.
500 mg. (800,000 Units)
DATED
Lilly
ELI LILLY AND COMPANY, INDIANAPOLIS, U.S.A.

Description: V-Cillin K is the potassium salt of V-Cillin® (phenoxymethyl penicillin, Lilly). This chemically improved form combines acid stability with immediate solubility and rapid absorption. Higher serum levels are obtained more rapidly with this penicillin than with equal oral doses of penicillin G. The higher serum levels and acid stability of V-Cillin K make it a more dependable penicillin for oral use.

V-Cillin K, Pediatric, is an oral solution of clinically proved V-Cillin K in teaspoon dosage form. When mixed as directed, each 5 cc. (approximately one teaspoonful) will contain 125 mg. (200,000 units) phenoxymethyl penicillin as the potassium salt.

Indications: V-Cillin K has been shown to be effective in the treatment of streptococcus, pneumococcus, and gonococcus infections as well as infections caused by sensitive strains of staphylococci. It may be used for the prophylaxis of streptococcus infections in patients with a history of rheumatic fever and for the prevention of bacterial endocarditis after tonsillectomy and tooth extraction in those patients with a history of rheumatic fever or congenital heart disease.

Contraindication: V-Cillin K should not be administered to a patient with a history of penicillin hypersensitivity.

Precautions: V-Cillin K should be used cautiously, if at all, in a patient with a strongly positive history of allergy. Reactions occur more frequently in individuals with bronchial asthma or other allergies or in those who have previously demonstrated sensitivity to penicillin hypersensitivity reactions occur, the drug should be discontinued.

Adverse Reactions: Although serious allergic reactions are mu less common with administration of oral penicillin than with intramusc lar forms, skin rash, symptoms resembling those of serum sickness, other manifestations of penicillin allergy may occur. When penicillin administered, measures for treating anaphylaxis should be readi available. Those include epinephrine, oxygen, and pressor drugs f relief of immediate allergic manifestations as well as antihistamin and corticosteroids for delayed effects.

The use of antimicrobial agents may be associated with the ove growth of antibiotic-resistant organisms; in such a case, antibiotic a ministration should be stopped and appropriate measures taken.

Administration and Dosage: For Tablets V-Cillin K and for V-Cil K, Pediatric, the usual dosage ranges from 125 mg. (200,000 unit three times a day to 500 mg. (800,000 units) every four hours. For i fants, the daily dosage may be 50 mg. per Kg. of body weight divide into three doses.

Beta-hemolytic streptococcus infections without associated bact remia may be treated with 200,000 to 400,000 units three times a dc Therapy should be continued for a minimum of ten days to prevent d velopment of rheumatic fever and/or other serious complications. Dc age for routine streptococcus prophylaxis in patients with a history rheumatic fever or congenital heart disease may be 200,000 units onc or twice daily. When such patients undergo tonsillectomy, tooth extra tion, or other minor surgery, the prophylactic dose should be 500,0 units every six hours given two days prior to surgery and for two da postoperatively. If oral medication is not feasible on the day of su gery, parenteral therapy should be considered. Mild to moderate severe pneumococcus pneumonia has been treated effectively wi 250 mg. every six hours.

In staphylococcus infections, 400,000 units or more should be give every six to eight hours in conjunction with indicated surgical proc dures.

For gonorrhea in males, 500 mg. (800,000 units) every six hours f three doses may be employed; in females, 500 mg. every four hours f six doses are recommended. Patients with a suspected lesion of syphi should have a dark-field examination before receiving penicillin a monthly serologic tests for a minimum of three months.

How Supplied: Tablets V-Cillin K, U.S.P., 125 mg. (200,000 units), bottles of 50 and 100; 250 mg. (400,000 units), and 500 mg. (800,0 units) in bottles of 24 and 100.

V-Cillin K, Pediatric, for Oral Solution, 125 mg. (200,000 units) p 5 cc. of solution, in 40, 80, and 150-cc.-size packages.

Additional information available to physicians upon request. Eli Lilly and Company, Indianapolis, Indiana 46206.

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Smith Now Chairman Of Parke-Davis

Austin Smith, M.D., former Editor of *JAMA* and former President of the Pharmaceutical Manufacturers Association, is the new Chairman and Chief Executive Officer of Parke, Davis & Company.

Harold W. H. Burrows, who has been with Parke-Davis since 1948, continues as President and Chief Operating Officer, a position he began a year ago.

Larry J. Loynd, who had been Executive Officer since 1961, retired on December 31.

Dr. Smith, 54, who received his medical degree from Queen's University, was elected to the Parke-Davis board of directors in December, 1965, and became Vice Chairman a year ago.

Invite Scholarship Candidates For Alcoholism Institute

The Alcoholism Program of the Michigan Department of Public Health is offering 50 scholarships to physicians, teachers and others to the Midwest Institute of Alcohol Studies and the Rutgers Summer School of Alcohol Studies.

Both professionals and lay people in Michigan can apply for the scholarships which will provide room, board, and tuition. Selection will be made on the basis of profession, geographic location, education, and the ability to use the new knowledge gained at an institute.

Applications can be obtained from the Michigan State Department of Public Health Alcoholism Program, 212 South Grand, Lansing, Michigan 48913.

LEADS FLINT GPs

The new President-Elect of the Flint Academy of General Practice is George D. Beyer, M.D., Clio. Louis B. Coriasso, M.D., is now President, and Robert W. Schmidlin, M.D., is Secretary-Treasurer. Both are from Flint.

AMONG WINNER AUTHORS

Medical Economics magazine has just announced that George J. Smit, M.D., Holland, has received an awards certificate for contributing an outstanding article during 1966. Doctor Smit was the only winner.

TABLETS

Equagesic®

(meprobamate and ethoheptazine citrate with aspirin) Wyeth®

Precautions: Keep out of reach of children. Carefully supervise dose and amounts prescribed, especially for patients prone to overdose themselves. Excessive prolonged use of meprobamate may result in dependence or habituation in susceptible persons—as ex-addicts, alcoholics, severe psychoneurotics. Withdraw gradually after prolonged high dosage to avoid possibly severe withdrawal reactions including epileptiform seizures. Warn patients of possible reduced alcohol tolerance. If drowsiness, ataxia or visual disturbances occur, reduce dose. If symptoms persist, caution patients against operating machinery or driving. Give cautiously to patients with suicidal tendencies. Treat attempted suicide with immediate gastric lavage and appropriate supportive therapy

Side Effects: Ethoheptazine and aspirin may occasionally cause nausea, vomiting, epigastric distress, and rarely dizziness and CNS depression. Overdosage may result in salicylate intoxication. Meprobamate rarely causes allergic or idiosyncratic reactions. These reactions, sometimes severe, can develop in patients receiving only 1 to 4 doses who have had no previous contact with meprobamate. Mild reactions are characterized by urticarial or erythematous maculopapular rash. Acute nonthrombocytopenic purpura with petechiae, ecchymoses, peripheral edema and fever have been reported. Meprobamate should be stopped and not reinstituted. Severe reactions, observed very rarely, include angioedema, bronchial spasms, fever, fainting spells, hypotensive crises (1 fatal case), anaphylaxis, stomatitis and proctitis (1 case) and hyperthermia. A few cases of leukopenia, usually transient, have been reported following prolonged dosage. Rarely, cases of aplastic anemia (1 fatal case), thrombocytopenic purpura, agranulocytosis, and hemolytic anemia have been reported; almost always, in the presence of known toxic agents.

Contraindications: History of sensitivity or severe intolerance to aspirin or meprobamate.

Composition: 150 mg. meprobamate, 75 mg. ethoheptazine citrate and 250 mg. aspirin per tablet.

Wyeth Laboratories Philadelphia, Pa.

Weighing on his mind, too

When pain evokes anxiety and tension, thereby heightening patient discomfort, a simple analgesic may only touch on part of the problem.

This single-prescription, nonnarcotic product, however, usually provides effective analgesia *and* helps put the patient's mind at ease.

31,000 Medical School Profs Needed by '75

The number of full-time faculty in U. S. medical schools has increased almost four-fold in the last 15 years, from 3,933 in the 1950-51 school year to 15,514 in the 1964-65 school year.

While the overall supply of faculty has kept up with demand (except in selected areas such as anatomy and pathology), the Association of American Medical Colleges anticipates "difficulties in meeting future needs" imposed by expansion of existing schools, construction of new ones and demands of the federal program for cancer, heart and stroke centers.

Rough estimates by the AAMC put the faculty need at 31,000 by 1975.

Auxiliary Liaison

One of the highlights reported by the Oakland County Medical Society during 1966 was the attendance of the Woman's Auxiliary members at the county medical society meetings on a regular basis.

ROLLING SIDEWALKS

"Rolling sidewalks from the parking lots for heart patients" is one of the ideas submitted for improving the service at the University of Michigan Medical Center. Patients' advice was solicited through a questionnaire distributed by the hospital as a means of improving its service.

Books Received

The Consumers Union Report on Family Planning. Second Edition. 191 p.p. $1.75 Consumer Union of U.S., Inc., Mount Vernon, New York 1966.

It All Started with Hippocrates. By Richar Armour. 136 p.p., illustrated. $3.95 McGraw-Hil Book Company, New York, 1966.

Conflict in Society: A Ciba Foundation Symposium. Edited by Anthony de Reuck and Juli Knight (multiple contributors). $13.00 Littl Brown and Company, Boston, 1966.

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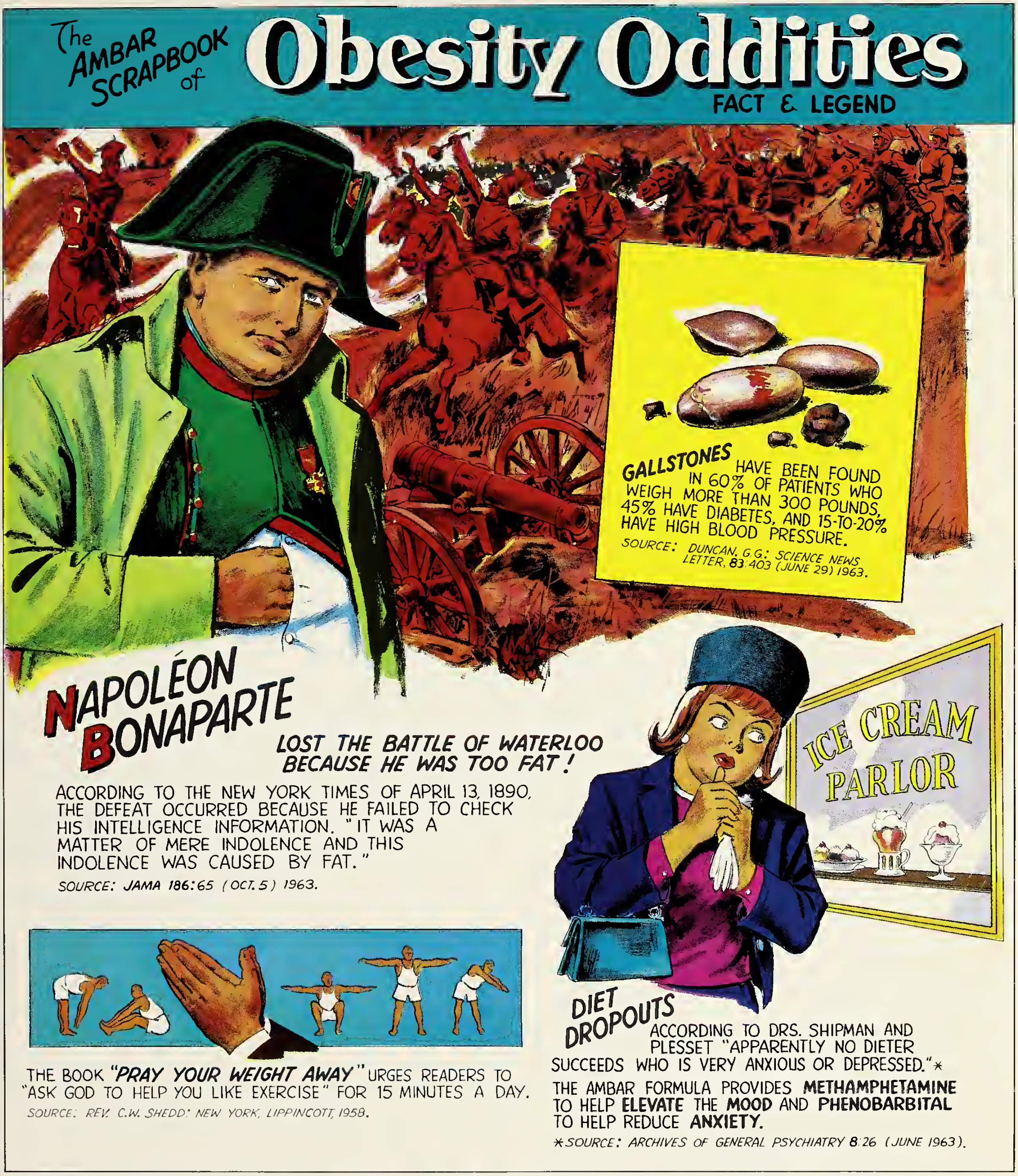

GALLSTONES HAVE BEEN FOUND IN 60% OF PATIENTS WHO WEIGH MORE THAN 300 POUNDS, 45% HAVE DIABETES, AND 15-TO-20% HAVE HIGH BLOOD PRESSURE.

SOURCE: DUNCAN, G.G.: SCIENCE NEWS LETTER, 83:403 (JUNE 29) 1963.

NAPOLÉON BONAPARTE

LOST THE BATTLE OF WATERLOO BECAUSE HE WAS TOO FAT!

ACCORDING TO THE NEW YORK TIMES OF APRIL 13, 1890, THE DEFEAT OCCURRED BECAUSE HE FAILED TO CHECK HIS INTELLIGENCE INFORMATION. "IT WAS A MATTER OF MERE INDOLENCE AND THIS INDOLENCE WAS CAUSED BY FAT."

SOURCE: JAMA 186:65 (OCT. 5) 1963.

THE BOOK *"PRAY YOUR WEIGHT AWAY"* URGES READERS TO "ASK GOD TO HELP YOU LIKE EXERCISE" FOR 15 MINUTES A DAY.

SOURCE: REV. C.W. SHEDD: NEW YORK, LIPPINCOTT, 1958.

DIET DROPOUTS ACCORDING TO DRS. SHIPMAN AND PLESSET "APPARENTLY NO DIETER SUCCEEDS WHO IS VERY ANXIOUS OR DEPRESSED."*

THE AMBAR FORMULA PROVIDES **METHAMPHETAMINE** TO HELP **ELEVATE** THE **MOOD** AND **PHENOBARBITAL** TO HELP REDUCE **ANXIETY**.

**SOURCE: ARCHIVES OF GENERAL PSYCHIATRY 8:26 (JUNE 1963).*

CONTROL FOOD AND MOOD ALL DAY LONG WITH A SINGLE MORNING DOSE

Ambar #2 Extentabs®

methamphetamine HCl 15 mg.,
phenobarbital 64.8 mg. (1 gr.)
(Warning: may be habit forming)

One Ambar Extentab before breakfast can help control most patients' appetite for up to 12 hours. Methamphetamine, the appetite suppressant, gently elevates mood and helps overcome dieting frustrations. Phenobarbital, the sedative in Ambar, controls irritability and anxiety ...helps maintain a state of mental calm and equanimity. Both work together to ease the tensions that erode the willpower during periods of dieting. *Also available:* Ambar #1 Extenabs®—methamphetamine hydrochloride 10 mg., phenobarbital 64.8 mg. (1 gr.) (Warning: may be habit forming).

BRIEF SUMMARY—**Indications:** Ambar suppresses appetite and helps offset emotional reactions to dieting. **Side Effects:** Nervousness or excitement occasionally noted, but usually infrequent at recommended dosages. Slight drowsiness has been reported rarely. **Precautions:** Administer with caution in the presence of cardiovascular disease or hypertension. **Contraindications:** Hypersensitivity to barbiturates or sympathomimetics; patients with advanced renal or hepatic disease. See package insert for further details.

A. H. ROBINS CO., Richmond, Virginia 23220 A-H-ROBINS

"I can breathe again," he said openly.

in sinusitis, colds, U. R. I.

Dimetapp® Extentabs®

(Dimetane® [brompheniramine maleate], 12 mg.; phenylephrine HCl, 15 mg.; phenylpropanolamine HCl, 15 mg.)

up to 10-12 hours clear breathing on one tablet

It's clear—Dimetapp lets your "stuffed-up" patients breathe easy again. Each hard-working Extentab brings welcome relief from the stuffiness, drip and congestion of upper respiratory conditions for up to 10-12 hours. Yet, patients seldom experience drowsiness or overstimulation. The key to success is the Dimetapp formula: Dimetane (brompheniramine maleate)—along with phenylephrine and phenylpropanolamine, two time-tested decongestants. They get the job done... in a hurry.

Contraindications: Hypersensitivity to antihistamines. Not recommended for use during pregnancy. **Precautions:** Until patient's response has been determined, he should be cautioned against engaging in operations requiring alertness. Administer with care to patients with cardiac or peripheral vascular diseases or hypertension. **Side Effects:** Hypersensitivity reactions including skin rashes, urticaria, hypotension and thrombocytopenia have been reported on rare occasions. Drowsiness, lassitude, nausea, giddiness, dryness of the mouth, mydriasis, increased irritability or excitement may be encountered.
Dosage: 1 Extentab morning and evening. **Supplied:** Bottles of 100 and 500.

A. H. ROBINS CO., Richmond, Virginia 23220

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From Grand Rapids Press: More Doctors Coming

It is good news for all of Michigan that the federal government has awarded Wayne State University Medical School a grant of $4.7 million to help pay for a new $23 million basic science building. The Legislature has promised another $12 million which, with funds already received, will make it possible to complete the building by 1968. And completion of the building will permit WSU to increase its enrollment of medical students from the present 125 to 200 within two years.

Thus there is definite prospect that within the next few years the number of interns available for assignment to Michigan hospitals will be substantially increased. When the extra 75 will enter actual practice will be determined by the fields they choose.

Assuming that all or most of them will become resident physicians to complete their training, it may be as much as eight to ten years before the full impact of the increase in enrollments is felt. But that is a better prospect than the state has had for many years.

The enlarging of WSU's Medical School was a decision concurred in by the University of Michigan's Medical School and most of the state's medical experts. Detroit is the logical place for an expanded medical school, since the faculty is available, a potentially large number of medical students is readily at hand, and the special training facilities that large hospitals provide also are there. Given these advantages, Wayne State must be counted on to expand its enrollments well beyond the limits now set for its new facilities if the critical shortage of doctors in Michigan ultimately is to be relieved; for the fact is that the number of new doctors entering the profession has lagged badly behind population growth and a general increase in the demand for medical services.

URGES UNINTERRUPTED SLEEP

One of the recommendations given the recent 52nd Annual Clinical Congress of the American College of Surgeons is that patients in intensive care units of hospitals be allowed as much uninterrupted sleep as possible.

Donald S. Kornfield, M.D., of Columbia University made the recommendation in presenting a report on the psychological hazards in intensive care units. He said that the environment of the units sometimes produced temporary psychotic effects on patients, usually during the third to fifth post-operative day.

ANOTHER ANNUAL SESSION PHOTO: Mrs. Juanita Ferman, right, of Jackson, receives the annual award given by Michigan Blue Shield to the outgoing president of the Medical Assistants Society. Called the "Blue Shield Emmy Award," it is given each year to the president in appreciation of her cooperation with Blue Shield. The award was presented by Helen Schick and John Verbiest of Michigan Blue Shield.

Muskegon Mental Health Center To Provide 250 Beds

The State Administrative Board on October 3, 1966, awarded contracts totalling $3,819,587 for construction of the Muskegon Mental Health Center.

Completion of the 250-bed facility on a 40-acre site in Muskegon is scheduled for October 1968 to serve the counties of Lake, Mason, Muskegon, Newaygo, Oceana and Ottawa. Total completed cost is expected to be $5 million.

This center, the first of several planned for decentralizing Michigan's mental hospitals, will have 160 beds for long-term, intensive residential treatment and 90 beds for short-term treatment. Offered will be outpatient services, a nursery, services for the deaf, blind and physically handicapped, and a vocational and social training program. Governor Romney has termed the project "another major step in the modernization of Michigan's mental health program."

The 1966 MSMS House of Delegates directed appointment of a permanent committee of the House to implement a medical staff survey of hospitals in Michigan, when such a survey is requested by the medical staff of that hospital or by the executive committee of the staff of such hospital.

For people who eat
more than one meal a day

A PLEGINE (Phendimetrazine bitartrate) tablet taken an hour before each meal affords peak activity at mealtime, when it is needed most. Reminds patients to eat according to your prescribed diet plan.

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BRAND OF
Phendimetrazine bitartrate

provides peak appetite suppression when it's needed most

Indications: Recommended in the management of excessive appetite leading to obesity.

Cautions and Contraindications: No adverse effects on blood pressure, heart rate, and respiration have been reported. However, as is true for all medications of this type, PLEGINE (Phendimetrazine bitartrate) is not recommended for patients with coronary disease, severe hypertension, or thyrotoxicosis, and should be used with caution in highly nervous or agitated individuals.

Side Effects: There have been occasional reports of insomnia and nervousness. Rare instances of mouth dryness, nausea, blurring of vision, dizziness, constipation, and stomach pain have been noted.

AYERST LABORATORIES New York, N.Y. 10017 · Montreal, Canada

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in memoriam

Russell A. Barnhardt, md, physician for the Ford Motor Company, died December 23 at his home in Birmingham. He was 59.

Formerly of New Brunswick, N.J., Doctor Barnhardt was graduated from the University of Pennsylvania Medical School in 1932. Doctor Barnhardt's medical memberships included the Aerospace Medical Association, the Pan American Medical Association and Phi Rho Sigma medical fraternity.

During World War II Doctor Barnhardt served as a U.S. Air Force flight surgeon and held the reserve rank of colonel.

Morris M. Burstein, m.d., Detroit physician for 35 years, died December 27 at Grace-Central Hospital. He was 66.

A graduate of Wayne State University, Doctor Burstein was a member of the American Academy of General Practice and Phi Delta Epsilon medical fraternity.

Ethan B. Cudney, md, 71, Past President of the Oakland County Medical Society, died December 15 at his home in Bloomfield Hills.

A 1922 graduate of the George Washington Medical School, Washington, D.C., Doctor Cudney served on the staff of Pontiac General Hospital and St. Joseph Mercy Hospital, Pontiac, and William Beaumont Hospital in Royal Oak. Until his retirement in 1957, Doctor Cudney was medical director of the Pontiac Motor Car Division of General Motors Corporation. A former delegate to the MSMS House of Delegates, Doctor Cudney served on several committees of the Society.

Doctor Cudney was a member of the Industrial Medical Society of Michigan, the National Industrial Medical Society and the National Board of Industrial Health and a Life Member of the Michigan State Medical Society.

During World War I Doctor Cudney served in the Medical Corps.

William Jend, md, veteran Detroit physician, died December 14 at his residence. He was 90 years old.

A general practitioner, Doctor Jend retired from active practice six years ago. Doctor Jend was graduated from Ohio State University Medical School in 1902 and was affiliated with Grace Hospital where he practiced medicine for 58 years.

Doctor Jend was a Life Member of the Michigan State Medical Society and in 1952 received its 50 Year Award.

Among the survivors is a son, William Jend, Jr., also a physician of Detroit.

Daniel J. Hackett, m.d., 71, died January 9 at his home in Pontiac.

A Pontiac physician for 41 years, Doctor Hackett was affiliated with St. Joseph and Pontiac General Hospitals. A graduate of Chicago Loyola University School of Medicine, he was a Life Member of the Michigan State Medical Society.

In World War I Doctor Hackett served in the 102nd Infantry, 26th Division, A.E.F.

Longtime medical examiner for the Pontiac Golden Gloves boxers, Doctor Hackett was a member of B.P.O.E. 810 and Cook-Nelson American Legion Post.

John F. Jellema, m.d., 69, Holland, died December 13 at St. Mary's Hospital, Grand Rapids. Born in Chicago, Doctor Jellema attended Calvin College, Hope College, and the University of Michigan Medical School, from which he received his medical degree.

Plant physician for Fisher Body Division Plant No. 2, General Motors Corporation, Doctor Jellema was in private practice in Grand Rapids from 1944 to 1953.

Long interested in the treatment of alcoholism, Doctor Jellema was medical director of the Greater Detroit Council on Alcoholism from 1962 to 1965. He also served as chairman of committees on alcoholism of the American Industrial Medical Association and of the Kent County Medical Society. He was the first medical director of the Kent County Clinic for Alcoholics from 1953 to 1961.

Guy L. Loranger, m.d., Detroit physician and a medical consultant for the Veterans Administration, died January 5 in St. John Hospital. He was 60.

A native of Detroit, Doctor Loranger was graduated from Notre Dame University and Wayne State University School of Medicine. During World War II, he served in the Army Medical Corps with the 5th Field Hospital in the Pacific.

His medical fraternity is Phi Rho Sigma.

Joseph P. Markey, md, 61, Past President of the Saginaw County Medical Society and former delegate to MSMS, died December 8 at St. Mary's Hospital, Rochester, Minnesota.

A lifelong resident of Saginaw, Doctor Markey began practice there in 1934. Doctor Markey received his medical degree from the Loyola University School of Medicine in 1932 and was a past chairman of its Saginaw-Bay City Alumni Association. Doctor Markey's memberships included the American Academy of General Practice and Phi Chi medical fraternity. He was a staff member of St. Mary's Hospital and on the courtesy staff of St. Luke's and Saginaw General, all of Saginaw.

A brother, Doctor Francis L. Markey, also of Saginaw, is among the survivors.

Henry J. Naud, m.d., Detroit, died January 3 at the age of 70.

A longtime Detroit pediatrician, Doctor Naud was a graduate of McGill University, Montreal, and he was on the staffs of Mt. Carmel Mercy and Children's Hospitals. He was medical resident at Harper Hospital.

Doctor Naud was a Life Member of the Michigan State Medical Society.

John W. O'Neill, m.d., 83, White Cloud, a delegate some time ago to the MSMS House, died December 20 at his home.

Until his recent retirement, Doctor O'Neill was director of the District Health Department.

Doctor O'Neill, a graduate of the University of Minnesota Medical School, was affiliated with Gerber Memorial Hospital, Fremont. He was a member of the Michigan Health Officers' Association and had served as president of the Newaygo County Medical Society.

George E. Sands, m.d., Port Huron, died January 9 at Marwood Manor. He was 73.

A graduate of the University of Toronto Medical School, Doctor Sands interned at Grace Hospital, Detroit and began his private practice in Detroit, where he lived for 31 years.

During World War I Doctor Sands served with the 63rd Battery, Canadian Field Artillery, from 1916 to 1919.

A charter member of the American Association of General Practitioners, Doctor Sands also held memberships in St. Paul's Lodge, F. and A.M., Sarnia, the Blue Water Shrine, Port Huron Commandery No. 7, Knights Templar, the Hi-12 Club and the Torch Club.

Doctor Sands was a Life Member of the Michigan State Medical Society.

William S. Summers, m.d., 82, died January at his home in Lake Worth, Florida, where h had been living following his retirement as a Detroit ophthalmologist.

A graduate of Johns Hopkins University, Doctor Summers was a member of the American College of Surgeons, the American College of Ophthalmologists, and he was a Life Member of th Michigan State Medical Society.

Other organizations in which Doctor Summer held membership are the Palestine Lodge 35 F. & A.M., the Palestine Shrine, and Scottish an York Rite organizations.

Siegfreid W. Thieme, md, one of West Michigan's oldest physicians at Ravenna died Decembe 7 at Hackley Hospital in Muskegon. He was 86

A native of Evansville, Indiana, Doctor Thiem was graduated from the Loyola University Schoo of Medicine in 1906. Doctor Thieme did postgraduate work in Edinburgh, Scotland. Followin his internship at Mercy Hospital in Muskegon Doctor Thieme set up practice in Ravenna, wher he served many years.

Named Muskegon County Doctor of the Yea in 1949, Doctor Thieme was granted the 50 Yea Award of the Michigan State Medical Society i 1957.

Doctor Thieme was a Life Member of th Michigan State Medical Society.

Henry J. Vanden Berg, m.d., Grand Rapid physician for more than 65 years, died January 1 at Blodgett Memorial Hospital. He was 88.

Doctor Vanden Berg, a native of Zeeland, attended Hope College, was graduated from th University of Michigan Medical School in 1905 and did postgraduate work in medicine at th University of Vienna in 1909-10.

Having served as chief of staff at Blodgett Hospital, Doctor Vanden Berg was also affiliated with Butterworth and St. Mary's Hospitals.

Medical organizations in which Doctor Vanden Berg was a member include the American College of Surgeons, American Geriatrics Society, American Goiter Association, and the Volunteer Medical Service Corps.

Doctor Vanden Berg was also a member of the rand Rapids Symphony Society, East Grand apids Planning Commission, Founder's Group, ew York Academy of Science, American Medical riters' Association, and the Peninsular, Torch, otary and Grand Rapids Yacht Clubs.

He was a Life Member of the Michigan State edical Society.

Richard W. Watkins, md, Benton Harbor tolaryngologist, died December 8 at St. Joseph emorial Hospital at age 76.

Born in Granville, Ohio, Doctor Watkins reeived his BS degree from Denison University in 913 and served as an instructor in anatomy at ew York University from that year until 1915. octor Watkins was graduated from Rush Medical ollege in Chicago in 1919 and was assistant proessor of anatomy at the University of Chicago rom 1918 to 1920. He practiced as an ear, nose and hroat specialist in Chicago from 1919 to 1960 hen he opened his office in Benton Harbor where e practiced until his death.

Doctor Watkins was a diplomate of the Amercan Board of Otorhinolaryngology and a member f Sigma Xi. He was a member of the staffs of St. oseph Memorial Hospital, Mercy Hospital, Benon Harbor, and the courtesy staff of Lee Memrial Hospital in Dowagiac.

Doctor Watkins was a Life Member of the Michgan State Medical Society.

Merrill Wells, md, retired Grand Rapids inernist, died December 23 at Blodgett Memorial ospital where he was medical director from 1919 o 1921 and chief of staff in 1944-45, at age 77.

Born in Grand Rapids, Doctor Wells received his medical degree from Rush Medical College in 1914 and interned at Children's Memorial and Presbyterian Hospital, all of Chicago. Until his retirement in 1962, Doctor Wells was a consultant at Blodgett and a member of courtesy staffs of Butterworth and St. Mary's hospitals. He was a fellow of the American College of Physicians, the Academy of Internal Medicine, a member of the American Diabetes Association, the Michigan Society of Internal Medicine, the American Heart Association and Alpha Kappa Kappa and Delta Upsilon medical fraternities.

Doctor Wells was a captain in the Medical Corps during World War I.

A Life Member of the Michigan State Medical Society, Doctor Wells received its 50 Year Award in 1966.

T. Wendell Williams, m.d., Flint pediatrician, died December 20 in Hollywood, Florida. He was 44.

Doctor Williams began private practice in pediatrics at Saginaw in 1959; he also was employed parttime for three years at the Mott Children's Health Center.

A graduate of Meharry Medical College, Nashville, where he received his medical degree, Doctor Williams was also a graduate of the College of Pharmacy of the University of Michigan and had studied law at the Detroit College of Law.

Doctor Williams was the first Negro on the Flint school board, serving as secretary for two years before being selected treasurer, an office he held until his death. Doctor Williams was also serving his fifth year as President of the Michigan Conference Laymen's Organization and was a member of the board of directors of Payne Theological Seminary of the AME church.

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"PHYSIATRIST, specialist in Physical Medicine and Rehabilitation, with many years experience in chronic disease as well as skilled nursing home activities, is interested in acting as a consultant in the geographical area of Wayne, Oakland and Macomb Counties. Kindly contact Box # 36, 120 W. Saginaw Street, East Lansing, Michigan."

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GENERAL PRACTICE OPPORTUNITY: in association with three established General Practitioners in a community of 6,000 ten miles from State Capitol of Lansing, Michigan Hospital privileges available at three hospitals. Salary and percentage leading to partnership. Contact: S R. Robinson, M.D., 110 W. Jefferson Grand Ledge, Michigan, Phone: 517-627-7172.

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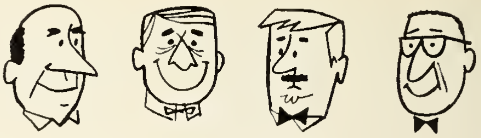

Preparing for the May 3 meeting of the American Cancer Society's Scientific Session in Dallas is Harry W. Fischer, M.D., Eloise. Dr. Fischer will speak on "Lymphangiography in the Diagnosis of Cancer" at the conference.

Boy Scouts in the Ottawa County area honored four physicians for giving free examinations to Scouts attending summer camp.

Recipients of the scouting tie clasp awards are: Donald De Witt, M.D., Holland; Jerome Dykstra, M.D., Holland; Alfred Vande Waa, M.D., Zeeland; and Jerome Wassink, M.D., Holland.

The Chlorine Institute has awarded a $20,000 grant to Arthur J. Vorwald, M.D., Detroit, to continue research and experimental studies.

Geoffrey L. Brinkman, M.D., Grosse Pointe, has received a $15,653 award from the Council of Tobacco Research to study the effect of cigarette smoking on the bronchial mucous membrane.

William W. Jack, M.D., Grand Rapids, Chairman of the Committee on Maternal Health of the Michigan State Medical Society, was recently named a member of the Committee on Maternal and Child Care of the American Medical Association.

Sidney Bolter, M.D., Ferndale, is the new medical director of Kingswood Hospital, succeeding Philip N. Brown, M.D. Dr. Bolter, who from 1956 to 1960 was director of education at Northville State Hospital, continues his private practice while holding his new position.

F. P. Rhoades, M.D., Detroit, is the new president-elect of the Academy of Psychosomatic Medicine.

James A. Peal, M.D., East Lansing, assistant director for mentally ill in the Michigan Department of Mental Health, was recently featured in the East Lansing *Towne Courier* Portrait column. There Dr. Peal explained his views on racial equality.

Recently named to the Board of Trustees of Detroit Adventure is Marjorie Peebles Meyers, M.D., Detroit. Dr. Meyers, a Wayne County Medical Society delegate to the MSMS House of Delegates, represents the International Institute on the Board.

The needs for physicians and health workers were explained by Michigan Health Council Executive John A. Doherty at a recent meeting of the Downrivers Counselors Association at Wyandotte.

Double honors were bestowed on V. K. Volk, M.D., Saginaw, while in San Francisco at two national meetings. The American Public Health Association and the American School Health Association both recognized him for his outstanding contributions to their organizations and to school health.

Alfred H. Whittaker, M.D., Grosse Pointe, is one of 17 members of the American Medical Writers' Association elected to Fellowship in recognition of outstanding achievement in one aspect or another of medical communication.

Harold M. Frost, M.D., Detroit, was recently appointed chairman of the department of orthopedic surgery at Henry Ford Hospital.

Ralph S. Green, M.D., Rochester, was one of four psychiatrists invited by the U.S. Department of Health, Education and Welfare to discuss the problem of "Custodial Care" in Baltimore at a recent conference.

and their friends

MICHIGAN MEDICINE
VOLUME 66, FEBRUARY 1967, NUMBER 4— NEWS EXTRA — DEADLINE FEBRUARY 15

Nine Bills to Be Introduced By MSMS in State Legislature

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BY M. A. RILEY
MSMS LEGISLATIVE REPRESENTATIVE

ACCEPTANCE OF NATIONAL BOARD OF MEDICAL EXAMINERS CERTIFICATIONS

The 1966 MSMS House of Delegates, in passing Resolution No. 60, introduced by Ingham County, recognized the need for more physicians in Michigan and alleged that many physicians have been lost to Michigan communities and medical school faculties because the Examinations of the National Board of Medical Examiners are not officially recognized by the Michigan Medical Practice Act.

The House directed that an amendment to the Act be prepared which would correct this situation, and provide that the Board of Registration would still be responsible for seeing to it that the quality of the National Board examination was equivalent to the registration requirements in Michigan. National Board examinations are presently accepted in 45 of the 50 states! The amendment is a simple one and should receive the support of all legislators.

BLOOD TRANSFUSION A SERVICE, NOT A SALE

Most courts have held that the transfer of blood by a hospital or a doctor to a patient is a service and not a sale, but recently at least one high court has taken the position that, with respect to a blood bank, this is a sale to which warranty principles apply. Serum Hepatitis, which is incapable of detection in the blood, provides a clear example of why it is impossible to "warrant" blood or guarantee it 100% "pure."

MSMS introduced a bill last year also covering transplanting of organs, bones, kidneys, etc., but the Legislature felt that such a bill was too broad and would include possible defects that could be ascertained by reasonable medical scrutiny. This year's bill will include only "whole blood, plasma, blood products, and blood derivatives." It provides a logical and sensible protection against a lawsuit on the basis of "implied warranty." Please urge your legislators to support the bill.

TO BAN CERTAIN TYPES OF FIRE EXTINGUISHERS

An individual member of MSMS has noted that present state law lists 11 chemical agents which are prohibited for use in fire extinguishers if such extinguishers are used in certain specified locations, such as hospitals, schools, jails, busses or other places where people tend to group. However, the same agents are not prohibited from use in *private homes and autos.*

Recently it was noted that an extinguisher which would have been prohibited from use in any location listed by law was being sold from door to door in a Michigan community. If used under certain circumstances it could produce a deadly gas which could quickly cause death. The MSMS bill, to protect the public,

The photograph of the granite eagle at the Highland Park Branch Post Office was provided to Michigan Medicine by Detroit Postmaster E. L. Baker.

MSMS to Introduce Nine Bills in Legislature

will provide that private homes and private autos be included among those places where the 11 dangerous chemical agents may not be used.

REPEAL OF MICHIGAN BASIC SCIENCE ACT

Once again, MSMS has introduced a bill to repeal Act No. 59 of the laws passed in 1937, known as the basic science law. This bill was originally proposed to require a basic floor of educational background insofar as chiropractors were concerned, something needed badly in 1937. The bill also affects MDs and DOs. In the last 30 years, necessity for such a law has grown less and less each year, and now for several years the chiropractic examinations themselves have included tests in the fundamental subjects covered by the Basic Science Act.

This has created a useless duplication of examination for chiropractors; however, the Basic Science Law, in requiring MDs and DOs to submit to examination in rudimentary subjects after they have graduated from medical school and have interned before they can be examined for licensure, has discouraged many physicians from coming to Michigan to practice or teach. Basic Science examination does no good, and it is a road-block to recruiting needed doctors to Michigan.

It should be repealed by the State Legislature this year. Please ask your legislators to help.

BILL TO CREATE A MENTAL HEALTH COMMISSION

In 1965 Michigan's governmental agencies were coordinated, consolidated, and revised through an "Executive Organization Act" which provided that a majority of the major divisions of the government would be managed by a single, policy-making executive officer responsible directly to the Governor. Several exceptions were permitted so that large agencies would be run by Boards or Commissions, but Mental Health was not one of them. This agency, which had previously had a Commission, received a Director. In an oversight, it was not specified that the Director would have to be a physician and no particular qualifications were called for.

With the concurrence of its Mental Health Committee, MSMS is again introducing a law calling for a change back to a Commission in this huge agency with its variety of programs dealing with mental health, mental illness, and retardation. A Commission of 5 members is called for with one being selected from nominees provided by MSMS, to assure medical representation in policy determinations. A Commission can bring a wide variety of professional and other experience to bear on policy decisions of a complicated nature; a Commission will provide desirable continuity as compared to a Director who may resign or be removed by a Governor and replaced when Governors are

(Continued on Page 267)

Medicine-Religion Workshop March 1

Moral and ethical issues facing physicians today will be discussed at the Medicine and Religion Workshop March 1 at the MSMS Headquarters. Chairmen of county society Medicine and Religion Committees and other invited guests will join the MSMS Committee members for a series of speeches and informal group discussions from 10:30 to 3:30.

Rev. Dr. Paul B. McCleave, Director of the AMA Department of Medicine and Religion, and Robert L. Coons, another member of that department, will come from Chicago to speak.

Winslow G. Fox, M.D., Ann Arbor, is chairman of the sponsoring MSMS Committee.

Interested physicians may obtain details by contacting the MSMS office.

AAGP President Coming to Detroit For PG Conference

The 21st Annual Postgraduate Clinic of the Michigan Academy of General Practice will be held on March 15-16 at the Sheraton-Cadillac Hotel in Detroit.

All physicians are invited to this conference and attendance will provide postgraduate credit in Category 1.

Carroll L. Witten, M.D., President of the American Academy of General Practice, will be the featured speaker at the banquet.

For a copy of the program write to Clarkson E. Long, M.D., 19751 James Couzens Highway, Detroit, Michigan.

SEE PAGE 1 FOR THE BEGINNING OF THIS LEGISLATIVE ARTICLE

changed. Michigan presently has no Director.

BILL TO CREATE A BOARD OF PUBLIC HEALTH

The same background pertains to Public Health as that set forth above for Mental Health. Although the Department of Agriculture, Department of Conservation, Department of Highways, and Department of Education, to name a few, are directed by Commissions, Health like Mental Health is managed by a single policy-making Director. Again, as in the case with Mental Health, the reorganization law failed to require any professional qualifications for such a Director.

MSMS is recommending that this complex state agency, for the same reasons as stated above, be placed under a 7-member policy-making Board. Two of such members would be MDs recommended by MSMS; one would be a DO recommended by the osteopathic organization. It is felt that a group of carefully selected experts from the major areas encompassed by "public health" can bring a helpful variety of backgrounds to policy making, and that a Board would provide a highly desirable continuity.

A BILL TO ASSURE A QUALIFIED MENTAL HEALTH DIRECTOR

Assuming that the MSMS bill to create a Mental Health Commission (above) is adopted, this Commission would itself select the chief executive employee of the Department, thus assuring his competency. However, MSMS is also introducing a separate bill to require, even under the present system, that the top man be Board certified in either Psychiatry or Neurology and have at least 5 years of pertinent experience. Presently, the head of the Mental Health Department could be appointed from any walk of life.

A BILL TO ASSURE A QUALIFIED PUBLIC HEALTH DIRECTOR

This bill is introduced by MSMS as a companion to the bill mentioned directly above. It is hoped that the Legislature will create a Board of Public Health, which would assure that the top administrative employee was qualified. If, however, the present system is retained this bill will require certification by the Board of Preventive Medicine or eligibility for certification, and at least 5 years of appropriate experience. Michigan now has a qualified chief state officer of public health, but he could be replaced at any time under present law by a person from any walk of life.

AMENDMENT TO PKU TESTING LAW

In 1965 the Legislature passed a new law requiring that any physician in charge at the birth of a newborn infant must see that the child received a phenylketonuria test approved by the State Health Commissioner. The 1966 MSMS House of Delegates has directed that a simple but important and practical amendment be now made to this law — the responsibility should be assigned to the physician in charge *of the care* of the newborn infant, *not* the physician in charge *at the birth.* This simple amendment should be approved by the legislature for obvious reasons, and you are asked to urge your legislator to support this MSMS bill.

CIVIL IMMUNITY FOR MEDICAL STAFF COMMITTEES

Pursuant to a suggestion to all state medical societies as passed by the AMA House of Delegates in 1966, MSMS is introducing a proposed new law which would provide immunity from civil liability for physicians serving on such medical staff in-hospital functions as tissue committees. The new law would specifically also state that the identity of the patient whose condition or treatment was studied would be kept confidential.

GENERAL COMMENT:

The MSMS Legal Affairs Committee, which has met twice during Michigan's worst blizzards in 45 years, has already reviewed a large number of other pieces of legislation. Several amendments have been prepared and will be urged when the legislature considers a bill in 1967 for hospital licensing (already 5 separate bills have been introduced on this subject). The Committee has assisted with the writing of a proposal to extend the medical examiner system to all counties of Michigan; it has reviewed proposed legislation to regulate hypnosis, and it has carefully reviewed a working draft of new proposed laws regarding sterilization and abortion.

1967 promises to be a typically crowded and busy legislative year. There will undoubtedly be a number of optometric and chiropractic proposals; there will be proposed a new Nurse Practice Act (which will be covered in depth and separately as soon as it is introduced), plus a wide variety of other medical legislation.

All of this will be regularly reported in *Michigan Medicine,* the Michigan Medicine *News Extra* at mid-month, or if necessary via special bulletins.

To help physicians follow these MSMS bills, your next issue of Michigan Medicine will give you the numbers of the bills. The bills as they are introduced will be assigned numbers by the Legislature.

Osteopathic College Question

During the 1965-1966 sessions of the State Legislature, a proposal to create a Michigan Osteopathic College Authority through legislation was thoroughly debated.

Early during this debate the Michigan Attorney General stated that the Legislature should seek the advice of the State Board of Education, the group constitutionally charged with the coordination of higher education, before taking action on the proposal. Proponents of the Osteopathic College made exhaustive presentations to various legislative committees, but did not present their views in any depth to the State Board of Education. Finally, approval of an Osteopathic College Authority was left to the House of Representatives and the Governor; in three successive votes, the House rejected the bill.

HAD THE HOUSE passed the bill, it would have been presented to the Governor, who had indicated that he was inclined to agree with the Attorney General that such a proposal clearly required prior review and recommendation by the State Board of Education.

The State Legislature had previously granted approval to Michigan State University to establish a two-year, pre-clinical School of Human Medicine.

Michigan State University, with an eye to eventually expanding this school to a full degree-granting medical school, had carefully and step-by-step developed its proposed program with the State Board of Education's Citizens Committee on Medical Education. This Committee, in late 1966, after careful review of a complete Michigan State University prospectus, recommended to the Board of Education that it (1) approve the Michigan State University request, and (2) also support expansion of medical education facilities at both the University of Michigan and Wayne State University.

AT THIS POINT, the Michigan Association of Osteopathic Physicians and Surgeons appeared before the State Board of Education seeking support for a school in Pontiac to graduate doctors of osteopathy. The State of Michigan has granted a charter for the operation of a private institution in Pontiac, a parcel of land has been obtained there, temporary office facilities have been erected and a group of individuals have been employed in administrative capacities.

As a result of the osteopathic appearance and request, the State Board of Education temporarily deferred its decision to approve a full medical school at Michigan State University and requested that its Citizens Committee on Medical Education be furnished with a detailed statement of the progress, plans and desires of the osteopathic group. On the basis of the information submitted as a result of this request, the Board of Education concluded that the "osteopathic college" in Pontiac was not far enough along in its development at the present time to warrant any Board action. At the same time, the Board approved the Michigan State University request and expressed its support for the expansion of existing Michigan Medical Schools.

The Osteopathic Association has stated to the Board of Education, however, that there are "meaningful differences" between the training of osteopaths and the training of doctors of medicine, and that these differences are of such significance that the training programs of DOs and MDs cannot be united. The Board of Education has requested a specific elaboration of this contention, along with any additional information in detail as to why it should support the osteopaths in their effort to develop a school at Pontiac. The Board has directed that such explanation and information, when developed, be presented to its Citizens Committee on Medical Education.

IN VIEW OF the fact that proponents of the Pontiac school to train osteopaths have taken their case to the Board of Education, it would appear that the matter should not be brought before the 1967 legislative session.

Members of the Citizens Committee on Medical Education of the State Board of Education are:

Mrs. Gilbert Pingree, Detroit
V. A. Stehman, MD, Lansing
Carl A. Moyer, MD, Houghton
Mr. Eugene Sibery, Detroit
Mr. William Marshall, Detroit
A. E. Heustis, MD, Lansing
Dr. Emory Morris, Battle Creek
Rabbi Jacob Segal, Detroit
Dr. Weimer K. Hicks, Kalamazoo
Mr. Nat Weinberg, Detroit

1967 Michigan Legislative Leadership Lists; Please Save

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Assistant Majority Leader: Charles Zollar (R) Benton Harbor
President Pro Tem (presiding officer in the absence of Lieutenant Governor William Milliken): Thomas Schweigert (R) Petoskey
Assistant President Pro Tem: Gilbert Bursley (R) Ann Arbor
Majority Floor Leader: Robert Vander Laan (R) Grand Rapids
Majority "Whip": Milton Zaagman (R) Grand Rapids
Minority Leader: Raymond Dzendzel (D) Detroit
Minority Floor Leader: Sander Levin (D) Berkley
Minority Caucus Chairman: John McCauley (D) Wyandotte

HOUSE OF REPRESENTATIVES

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Speaker Pro Tem (presiding in Mr. Waldron's absence): Martin Buth (R) Grand Rapids
Majority Floor Leader: William Hampton (R) Birmingham
Assistant Majority Floor Leader: Roy Spencer (R) Attica
Minority Floor Leader: Joseph Kowalski (D) Detroit
Assistant Minority Floor Leaders: Daniel Cooper (D) Oak Park, Albert Kramer (D) Oak Park, Dale Kildee (D) Flint, Bob Traxler (D) Bay City
Minority Caucus Chairman: William Ryan (D) Detroit
Assistant Minority Caucus Chairman: David Holmes (D) Detroit

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Harry DeMaso (R) Battle Creek
George Fitzgerald (D) Grosse Pointe Park
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Garland Lane (D) Flint
Jerome Hart (D) Saginaw
Joseph Mack (D) Ironwood

The above committees are referred the bulk of medically-oriented legislation. However, bills dealing with pre-payment insurance may be assigned to the Corporations Committee, George Kuhn (R) Birmingham, Chairman; bills on education are handled by the Education Committee; Harold Volkema (R) Holland, Chairman, various compensation proposals may be referred to the Labor Committee, Oscar Bouwsma (R) Muskegon, Chairman. If individual bills are reported to MSMS members and are under consideration in committees not named in full above, a list of the committee will accompany the information on the bill.

HOUSE OF REPRESENTATIVES COMMITTEES

State Affairs

Thomas Sharpe (R) Chairman, Howell
Robert Davis (R) Vice-chairman

(Continued on Page 270)

Continued: Legislative Lists to Save

STATE AFFAIRS (Continued)

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Peter Kok (R) Grand Rapids
Harold Stevens (R) Detroit
DeForest Strang (R) Sturgis
Nelson Tisdale (R) Midland
James Del Rio (D) Detroit
Josephine Hunsinger (D) Detroit
Dominic Jacobetti (D) Negaunee
Albert Kramer (D) Oak Park
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Thomas White (D) Detroit

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Carl Little (R) Saginaw
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Daniel Cooper (D) Oak Park
Dale Kildee (D) Flint
Michael Novak (D) Detroit
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Charles Varnum (R) Manistique
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Russell Hellman (D) Dollar Bay
Arthur Law (D) Pontiac
George Montgomery (D) Detroit
William Ryan (D) Detroit

SPECIAL COMMITTEES

All bills calling for the expenditure of state funds must be considered by both the Appropriations Committee of the Senate and the Ways and Means Committee of the House of Representatives. On the Senate Appropriations Committee, here are the sub-groups working in expenditure areas of medical interest:

Regulatory Services (Board of Registration in Medicine)

Harold Hungerford (R) Lansing, Chairman
Frank Beadle (R) St. Clair
Garland Lane (D) Flint

Welfare

Charles Zollar (R) Benton Harbor, Chairman
Milton Zaagman (R) Grand Rapids
Jerome Hart (D) Saginaw

Capital Outlay (State building programs)

Garland Lane (D) Flint, Chairman
Frank Beadle (R) St. Clair
Charles Zollar (R) Benton Harbor
Milton Zaagman (R) Grand Rapids

Similar sub-groups will be established by the House Ways and Means Committee and when announced they will be published.

The State Senate and House of Representatives also appoints a Joint Committee on Administrative Rules. This important committee reviews all rules and regulations developed by state agencies for the administration of laws which they are responsible for implementing. The Joint Committee, under the new State Constitution, has absolute power to veto administrative rules. Appointed:

Sen. Emil Lockwood (R) St. Louis
Sen. Robert Huber (R) Birmingham
Sen. George Kuhn (R) Birmingham
Sen. Sander Levin (D) Berkley
Rep. Don Pears (R) Buchanan
Rep. William Copeland (D) Wyandotte
Rep. Dale Warner (R) Eaton Rapids

The late Archer A. Claytor, M.D., Saginaw, left, is shown in this 1959 photograph reading the award given him by MSMS as Michigan's Foremost Family Physician. Surrounding Doctor Claytor are Donald Sargeant, M.D.; MSMS Councilor A. C. Stander, M.D., standing left; and Vernon V. Bass, M.D., standing right, all of Saginaw.

Six Regional Meetings Replace PR Conference

In the past, MSMS has held an annual County Secretaries-Public Relations Seminar, or an Officers Conference in Detroit or Lansing during January or February. But winter storms have always reduced the attendance. To increase the effectiveness of such efforts, MSMS will hold six Regional Conferences during February, March and April.

The conferences will provide basic information about MSMS services to county societies and to the members, and will also permit ample opportunity for questions about procedures, etc.

Invited are the county society presidents, presidents-elect, secretaries, editors and executive secretaries.

Sees Need in Michigan For New Revenues

"New revenues must be sought by the State Legislature this session," Clarence W. Lock, State Revenue Commissioner, told the Detroit News in a recent interview.

Mr. Lock predicted openly that Michigan must go to state income tax within two years.

Commissioner Lock said he didn't see any economy measures that would meet an appreciable deficit. "That is why I think new revenue is the only practical answer," he added.

Capitol observers feel it isn't likely that major cuts in state funds are likely for services and programs like mental health or education which together account for half of the state's budget.

House Resolution Pays Tribute to Doctor Claytor

A resolution expressing grief and praising the life and work of Archer A. Claytor, M.D., and his wife, Marie, was passed by the State House of Representatives following the February 1 murder of the Claytors at their home in Saginaw. The resolution was introduced by James E. O'Neill, Jr. (D-Saginaw).

Doctor Claytor practiced as a family physician in Saginaw for 30 years in accordance with the highest tenets of medicine, and in 1959 the Michigan State Medical Society named him Michigan's Foremost Family Physician.

The House resolution, in part, reads: "The Michigan Legislature . . . offers as a memorial, its highest tribute to the honorable Archer Adams Claytor, M.D., and to his wife, Mrs. Marie V. Claytor, as eminent citizens of Michigan whose lives exemplified all that is good among human-kind and whose professional, civic, and community work and sacrifice won the warm respect and admiration of their fellow beings in every walk of life."

Full information about the many contributions by Doctor Claytor will appear in the March issue of *Michigan Medicine.*

UT OUT AND RETURN THIS FORM ORDER VALUABLE MATERIALS

The following material may be useful to you. Check any item de- d, cut out the form and mail it in an envelope to MSMS, 120 West inaw, East Lansing, Michigan 48823. (Your address already is on back of this same cut-out area of the page.)

——— **Program for Michigan Conference on Maternal and Perinatal Welfare, March 15-16.**

——— **A supply of Medilabels for drivers licenses.**

——— **"Horizons Unlimited" Medical Careers Handbook for students, teachers, etc.**

——— **"Doctor's Handbook on Medicare" designed to help handle questions, forms, etc.**

Maternal, Perinatal Welfare Conference Soon at Flint

In addition to respected Michigan medical authorities, the Michigan Conference on Maternal and Perinatal Welfare will feature two distinguished physicians from St. Louis and Philadelphia, at Flint, March 15-16.

Philip R. Dodge, M.D., Professor and Head, Department of Pediatrics, Washington University School of Medicine, will lecture on "The Effect of Nutrition on the Developing Nervous System" at 2 p.m., March 15.

S. Leon Israel, M.D., Professor of Obstetrics and Gynecology, University of Pennsylvania School of Medicine, will discuss "The Role of the Physician in Family Life Education" at the banquet, March 15. Doctor Israel is known to many Michigan physicians as editor of the Journal of the American College of Obstetricians and Gynecologists.

All MSMS members are cordially invited to attend the Conference by Wm. W. Jack, M.D., Grand Rapids, Chairman of the sponsoring MSMS Committee on Maternal Health. The Clara Elizabeth Fund of Flint is again a cosponsor.

DODGE

ISRAEL

JOHN M. SHELDON, M.D.

Tribute Paid Doctor Sheldon At Rites, Feb. 14

Final tribute was paid February 14 at Ann Arbor to John M. Sheldon, M.D., nationally-recognized allergist and leader in postgraduate medicine, who died February 12. (A complete article will appear in the March issue of Michigan Medicine.)

Doctor Sheldon, a member of the University of Michigan Medical School faculty since 1933, was Professor of Internal Medicine, Head of the Department of Allergy and Director of the Department of Postgraduate Medicine.

Many honors had been bestowed on Doctor Sheldon. He recently was elected by the Michigan Health Council to the Michigan Health Hall of Fame and was presented with a coveted Certificate of Commendation by the MSMS House of Delegates in 1963.

Immediate Past President of the Washtenaw County Medical Society, he was President of the American Academy of Allergy in 1954-55 and was the Delegate to the AMA House of Delegates from the AMA Section on Allergy.

MICHIGAN MEDISCENE

- Feb. 24-25—Heart Days Forum, Michigan Heart Association, Sheraton-Cadillac Hotel, Detroit
- Mar. 15-16—Annual Michigan Conference on Maternal and Perinatal Welfare, Pick-Durant Hotel, Flint
- Mar. 15-16—Michigan Academy of General Practice, Sheraton-Cadillac Hotel, Detroit
- Apr. 3—Beaumont Lecture, Wayne County Medical Society Building, Detroit

(The Mediscene list in the February issue of Michigan Medicine projects through 1967.)

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MICHIGAN MEDICINE

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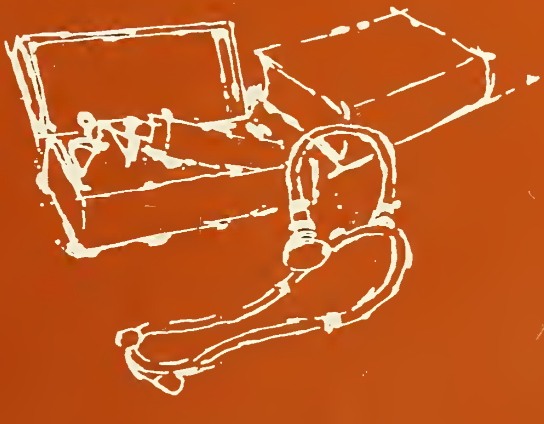
PAGES 346-347: MEDICAL SCHOOLS TODAY. PLANS FOR TOMORROW.



IN THIS ISSUE: PRESIDENT'S PAGE ABOUT LEGISLATION ☐ SCIENTIFIC ARTICLES ON "MATERNAL DEATH AND ABORTION IN MICHIGAN" AND OTHER TOPICS ☐ NEW DIRECTIONS IN NURSING EDUCATION ☐ MICHIGAN BLUE SHIELD REPORT ON MEDICARE ☐ NEWS ABOUT MANY ANCILLARY ACTIVITIES

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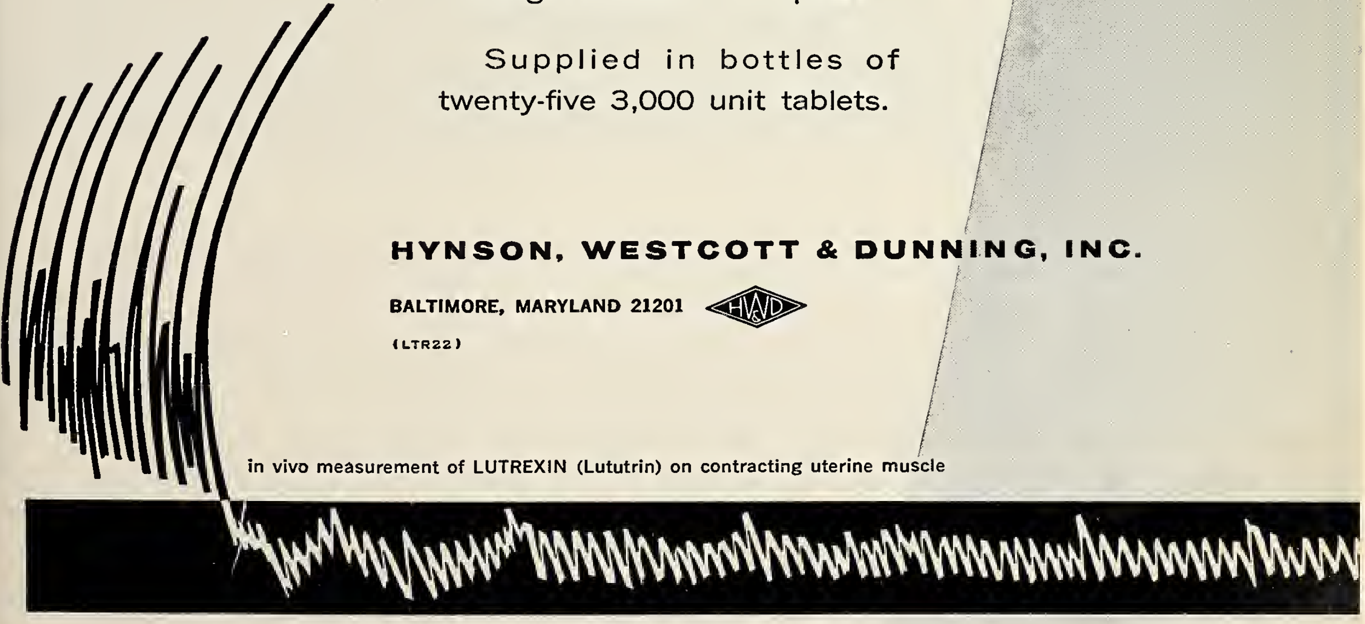

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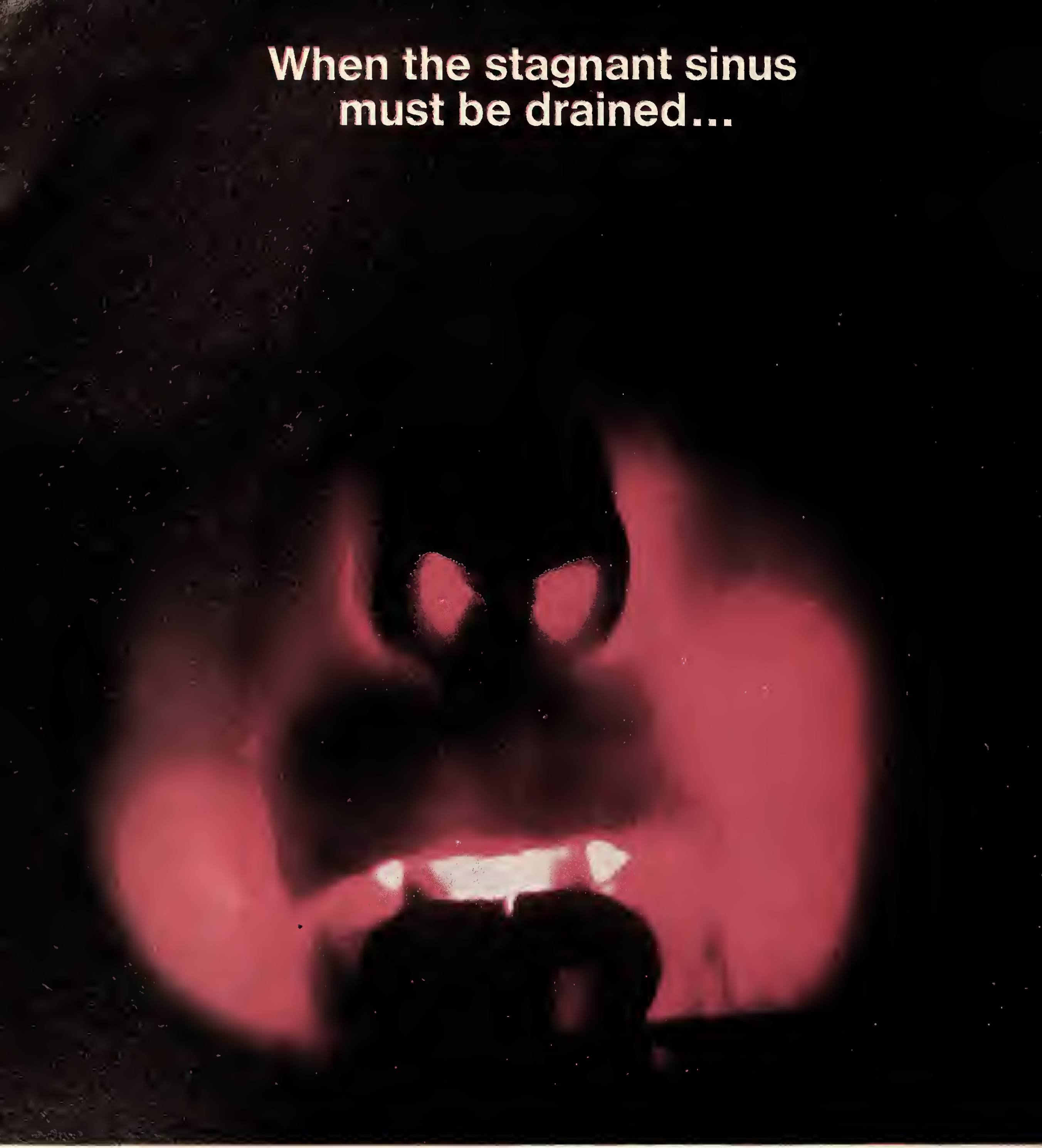

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Volume 66, Number 5

The cover this month refers Michigan physicians to pages 346 and 347 for quick, factual information about medical education in the nation. The art work was provided by the American Medical Association.

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president's message

The Influential Voice

The 1967 session of the Michigan State Legislature is now in the midst of its deliberations over the record number of bills introduced this year. More than the usual number of these bills are in some way related to the health of the people of Michigan and the practice of medicine by the members of our society.

The vital activity of county medical societies and MSMS in the legislative area has gone on for many years and no doubt will increase in the coming months. It must be pointed out, however, that such activity must be supplemented by the enthusiastic and sincere efforts of individual physicians.

Physicians as concerned citizens and as experts in the health field must demonstrate greater interest in legislative activities unless they wish to abandon this responsibility and permit other less competent individuals to influence decisions important to health and medical practice.

A MOST IMPORTANT influence in the decisions of the legislature is your voice, especially when it is used to communicate with your legislators, preferably back home.

In carrying out this very important activity certain legislative facts of life must be kept in mind:

1. It is very important to coordinate your efforts with those of your county medical society and MSMS. Contact the chairman or members of the legislative committee to find out the current status of the bill you are interested in before contacting the legislator.

2. Most statutes are the result of legislative compromise. Bills can be amended at any point in the legislative process to such a degree that the purpose of the original bill may be changed completed before final passage. Therefore, be sure to qualify your support or opposition to a bill — you should support it or oppose it in this form.

3. Contacts with legislators may be by personal visit, letters, telephone, or telegraph. Personal, informal visits when the legislator is home are frequently most effective. Whatever the type of contact, it should be dignified, respectful, without pressure, informative, and reflect the sincerity of the informer. Furthermore, it should refer to a specific bill or issue. The legislator should know who you represent — you as an individual, a voluntary association, or a business or professional activity.

4. It is important to know your own legislators — their political affiliations and philosophy, their legislative interests and committee assignments, and their business activities.

5. Take time to be completely informed about all aspects of the bill in question. There are two sides to each issue. Right or wrong are not always exclusively on one side or the other. You need to be armed with facts to be convincing.

MUCH CURRENT information on legislative matters is available in *Michigan Medicine* or other publications of MSMS or can be obtained by contacting county medical society legislative committee members or MSMS headquarters.

The importance of increased activity of each MSMS member in the legislative area cannot be overemphasized. I sincerely believe that this added individual effort when coordinated with the organized legislative activities of county medical societies and MSMS will again permit us to report a successful year in health legislation and thus further secure and improve the health of our citizens.

C Allen Payne MD

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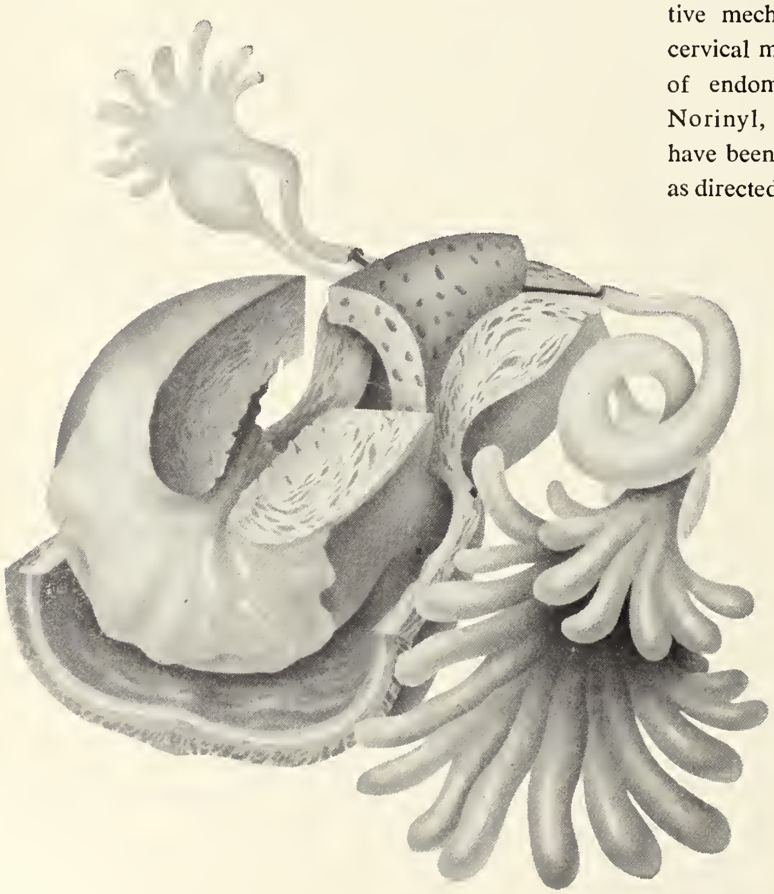

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Warning: Discontinue medication pending examination if there is sudden partial or complete loss of vision, or if there is a sudden onset of proptosis, diplopia or migraine. If examination reveals papilledema or retinal vascular lesions, medication should be withdrawn.

Precautions: By May 1963, experience with norethindrone 2 mg.—mestranol 0.1 mg. had extended over 24 months. Through miscalculation, omission or error in taking the recommended dosage of Norinyl, pregnancy may result. If regular menses fail to appear and treatment schedule has not been adhered to, or if patient misses two menstrual periods, possibility of pregnancy should be resolved before resuming Norinyl. If pregnancy is established, Norinyl should be discontinued during period of gestation since virilization of the female fetus has been reported with oral use of progestational agents or estrogen. When lactation is desired, withhold Norinyl until nursing needs are established. Existing uterine fibroids may increase in size. In metabolic or endocrine disorders, careful clinical preevaluation is indicated. A few patients without evidence of hyperthyroidism had elevated serum protein-bound iodine levels, which in the light of present knowledge, does not necessarily imply hyperthyroidism. Protein-bound iodine increased following estrogen administration. Bromsulphalein retention has occurred in up to 25% of patients without evidence of hepatic dysfunction. Studies from 24-hour urine collections have shown an increase in aldosterone and 17-ketosteroids and decrease in 17-hydroxycorticoid levels. Thus, Norinyl should be discontinued prior to and during thyroid, liver or adrenal function tests. Because progestational agents may cause fluid retention, conditions such as epilepsy, migraine and asthma require careful observation. Thus far no deleterious effect on pituitary, ovarian or adrenal function has been noted; however, long-range possible effect on these and other organs must await more prolonged observation. Norinyl should be used with caution in patients with bone, renal or any disease involving calcium or phosphorus metabolism.

Side Effects: Intermenstrual bleeding; amenorrhea; symptoms resembling early pregnancy, such as nausea, breast engorgement or enlargement, chloasma and minor degree of fluid retention (if these should occur and patient has not strictly adhered to medication plan, she should be tested for pregnancy); weight gain; subjective complaints such as headache, dizziness, nervousness, irritability; in a few patients libido was increased. In a total of 3,090 patients, 2.2% discontinued medication because of nausea.

NOTE: See sections on contraindications and precautions for possible side effects on other organ systems.

Dosage and Administration: One Norinyl tablet orally for 20 days, commencing on day 5 through and including day 24 of the menstrual cycle. (Day 1 is the first day of menstrual bleeding.)

Availability: Dispensers of 20 and 60 tablets; bottles of 100.

References: **1.** Council on Drugs. JAMA 187:664 (Feb. 29) 1964. **2.** Bryans, F. E.: Canad Med Ass J 92:287 (Feb. 6) 1965. **3.** Goldzieher, J. W.: Med Clin N Amer 48:529 (Mar.) 1964. **4.** Cohen, M. R.: Paper presented at Symposium on Low-Dosage Oral Contraception, Palo Alto, Calif., July 15, 1965. Reported in Med Sci 16:26 (Nov.) 1965. **5.** Hammond, D. O.: Ibid. **6.** Rice-Wray, E., Goldzieher, J. W., and Aranda-Rosell, A.: Fertil Steril 14:402 (Jul.-Aug.) 1963. **7.** Goldzieher, J. W., Moses, L. E., and Ellis, L. T.: JAMA 180:359 (May 5) 1962. **8.** Kempers, R. D.: GP 29:88 (Jan.) 1964. **9.** Tyler, E. T.: JAMA 187:562 (Feb. 22) 1964. **10.** Rudel, H. W., Martinez-Manautou, J., and Maqueo-Topete, M.: Fertil Steril 16:158 (Mar.-Apr.) 1965. **11.** Flowers, C. E., Jr.: N Carolina Med J 25:139 (Apr.) 1964. **12.** Goldzieher, J. W.: Appl Ther 6:503 (June) 1964. **13.** The Control of Fertility. Report adopted by the Committee on Human Reproduction of the American Medical Association. JAMA 194:462 (Oct. 25) 1965. **14.** Flowers, C. E., Jr.: JAMA 188:1115 (June 29) 1964. **15.** Merritt, R. I.: Appl Ther 6:427 (May) 1964. **16.** Newland, D. O.: Paper presented at Symposium on Low-Dosage Oral Contraception, Palo Alto, Calif., July 15, 1965. Reported in Med Sci 16:26 (Nov.) 1965.

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Let's Tell Others

BY DALE L. KESSLER, M.D., CHAIRMAN
MSMS COMMITTEE ON MEDICAL SOCIO-ECONOMICS

Michigan physicians have many opportunities — and responsibilities — to help their employees develop a basic understanding of America's competitive enterprise system.

Doctors can be praised for increasing their own awareness and understanding of economics. The next step would be to help their own employees understand more about the relation of productivity to salary, about the interdependence of employer and employee, etc.

The alarming need for greater economic understanding is stressed in a set of statistics used by Harry R. Hall, executive vice president of the Michigan State Chamber of Commerce, in a speech.

In part, here are some of the findings of surveys among employees: In one survey about "Which has done the most to improve living standards of the people in this country?" almost half of employees said union leaders, 18 percent said government, 18 percent said business and professional leaders, and 17 percent had no opinion.

In another study about "Who has done the most to protect the freedom of the individual in this country — governmental leaders, union leaders, or business leaders?" The answers were 59 percent government, 18 percent union leaders, 7 percent business leaders and 16 percent no opinion.

Another study found that only about 11 percent of employees have any correct knowledge on profits.

A study on productivity found that only 34 percent believed productivity is the key to raising living standards; and only a few related their own personal efforts to productivity.

Many other studies too have shown an appalling ignorance of economic facts of life.

Physicians, as conscientious communicators, can help to inform their employees — friends and family too — about the role of free enterprise and individual effort in our great nation.

Will you, as one individual physician, go to work and help start a chain reaction that could alter the present-day trends toward greater government domination?

What's Our Line?

BY MRS. HENRY A. SCOVILL, PRESIDENT
WOMAN'S AUXILIARY TO MSMS

Health education under the direction of our Michigan State Medical Society occupies a major role in Auxiliary work. Basically we are involved with the subjects of the health of children and youth of school age, and in assisting with community health volunteer programs at all levels. This is a large order. We are continually asking ourselves how effectively we are working with the Medical Society in promoting health education.

Auxiliary members take a leadership role, or a joint sponsorship role in many community-wide health projects, working in cooperation with other health organizations. We as auxiliary members cannot deal with health problems single handed, but the auxiliary demonstrates leadership in this field.

As our National President, Mrs. Asher Yaguda, has said, "Our immediate need is to escalate this leadership role."

OUR BUSINESS IS to provide factual health information to the public and to initiate health services in the community designed to help the sick and their families. With government now providing 90 percent of the nations health and welfare services, some may ask why we should bother or try to do anything more. But with the guidance of our doctors we are hoping to provide the services which will foster our American dream of a free society.

Our overall program this year includes the continuing support of AMAERF; support of good health legislation, and of AMPAC and MDPAC programs; International Health Activities; Rural Health, Safety, and Respiratory Disease problems; Health Careers program; Mental Health; and a many faceted Community Service program.

Special emphasis is being placed on promoting AMAERF since medical education and biomedical research is the foundation for the practice of medicine.

ALSO PLANS ARE underway for creating a better understanding of the AMPAC and MDPAC

Continued on Page 285

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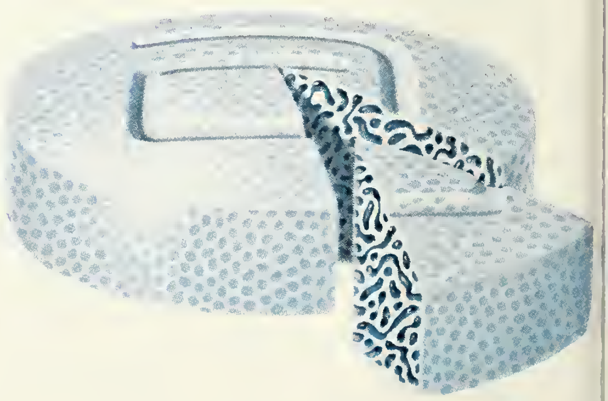

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See Brief Summary on next page.

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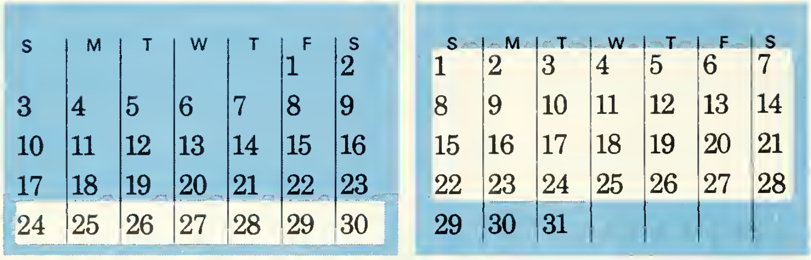

S	M	T	W	T	F	S
					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30

S	M	T	W	T	F	S
1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30	31				

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rogram among auxiliary members, thus gaining etter support for the program.

In the field of International Health Activities, ur contributions of supplies, drugs, and money ave played an important part in making it pos-ible for World Medical Relief to send needed naterials to Central and South America and to ietnam this year.

Our attention has been centered also on mental ealth problems, with particular emphasis on the nental health of the elementary and pre-school hild.

We are proud of our expanding health careers rogram, with the conversion of the Health Mobile o a Health Careers Mobile, and the numerous Iedical Careers Clubs and Future Nurses Clubs ponsored in the counties.

OUR COMMUNITY SERVICE programs cover nany facets of service to our communities. One mportant and timely program is sex education and enereal disease control, for which we are supply-ng program material for P.T.A.'s and aiding chools in getting films and pertinent literature.

In order to continue and expand our role in health education, under the direction of our Michigan State Medical Society, we need the active support of all doctors' wives. If we can achieve many of these goals with our present membership of approximately 3,500, think how much more could be accomplished if all of our doctors' wives, numbering over 7,000, would join our ranks.

Add: About Doctors

Making a most unusual and valuable contribution to the school where he studied medicine is HUGH STALKER, M.D., Grosse Pointe. Doctor Stalker has presented his 50-year collection of letters from many great men of medicine to the Harvard University Medical School. Included are letters signed by Freud, Pasteur, Darwin, Pavlov, Roentgen, Salk, Paul Dudley White, to name but a few.

Appearing as a guest speaker at the New Orleans Graduate Medical Assembly, March 6-9, will be ROBERT W. BAILEY, M.D., Ann Arbor. Dr. Bailey's topics will be "Fractures of the Spine," "Osteogenesis Imperfecta," and "Indications for Anterior Cervical Spine Fusion."

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1. Bradley, J. E., *et al.*: J. Pediat. *38*:41 (Jan.) 1951.
2. Bradley, J. E.: Mod. Med. *20*:71 (Oct. 15) 1952.
3. Crunden, A. B., Jr., and Davis, W. A.: Am. J. Obst. & Gynec. *65*:311 (Feb.) 1953.

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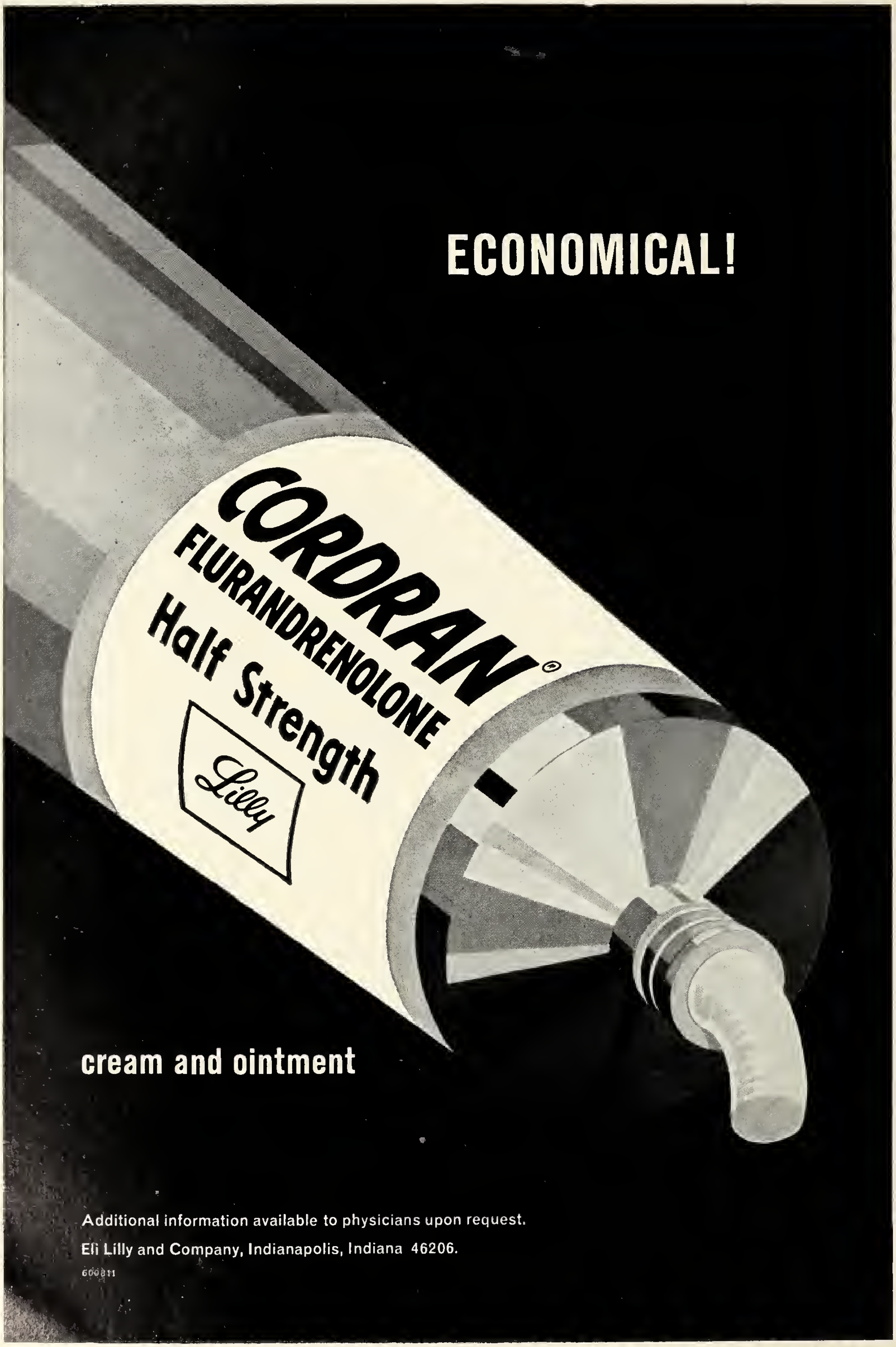
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Maternal Death and Abortion Michigan 1955-1964

BY LEE B. STEVENSON, M.D.
DETROIT, MICHIGAN

In Michigan maternal mortality is classified according to such etiologic factors as hemorrhage, infection, toxemia, vascular accidents, and anesthesia.

Abortion involves many, but not all of these factors.

A review of 677 maternal mortality case studies of the past decade has shown that abortion is responsible for an increasing number and an increasing percent of maternal deaths in Michigan. Abortion is a medical problem because of the social, economic, legal, and medical pressures which prevail today. Many state legislatures are reviewing laws pertaining to abortion with thoughts and hopes of revising them.

In 1961 the Los Angeles County Hospital reported over 3,500 patients treated for "illegal abortion." The New York Department of Health noted that in 1962 over 50 percent of all maternal deaths were the result of criminal abortions. During 1963 about one-third of the maternal deaths in Pennsylvania followed induced abortion. Dr. Mary Calderone, former Medical Director of the Planned Parenthood Federation of America, predicted that there would be approximately 1,200,000 criminal abortions or attempted abortions in the United States during 1964. Statisticians have indicated that there is one illegal abortion for every four births in our country today.[1]

CASE SUMMARIES from the Michigan Department of Health provided the data which was collected and reviewed by the Maternal Health Committee of the Michigan State Medical Society. Considering causes of the maternal deaths in Michigan and comparing abortion to the "Big Three" — hemorrhage, infection, and toxemia — it can be seen that abortion is responsible for a considerable proportion of the total maternal deaths in Michigan.

Maternal mortality from abortion, when compared with maternal mortality from all causes (Table 1), comprises more than a fifth of the deaths in the first five-year period — 1955-1959 — and more than a third in 1960-1964. The significant trend towards an increase in the percentage of maternal deaths from abortions is demonstrated.

TABLE 1
MATERNAL DEATH AND ABORTION
MICHIGAN 1955-1964

	Total Maternal Deaths	Number Abortion Deaths	Percent of Total Deaths
1955	63	13	21%
1956	81	19	23%
1957	74	12	16%
1958	72	17	24%
1959	66	13	20%
Total	356	74	
Average	71	15	21%
1960	67	22	33%
1961	70	26	37%
1962	58	16	28%
1963	63	31	49%
1964	63	25	40%
Total	321	120	
Average	64	24	37%

COMPARING THE five-year averages for the years 1955-1959 and the years 1960-1964 (Table 2), the rate of maternal deaths due to abortion is also rising. The average rate for the second five-year period is almost double the first five-year rate.

TABLE 2
MATERNAL DEATH AND ABORTION
MICHIGAN 1955-1964

	Number Abortion Deaths	Total Births	Matern Mortal “Rate
1955	13	196,294	0.66
1956	19	206,068	0.92
1957	12	208,488	0.57
1958	17	202,690	0.84
1959	13	198,301	0.65
Average '55-'59	14.8	202,368	0.73
1960	22	195,056	1.13
1961	26	192,825	1.35
1962	16	182,790	0.87
1963	31	178,871	1.78
1964	25	173,968	1.44
Average '60-'64	24	184,702	1.30

Gestation by weeks, an arbitrary artificial scale, is correlated with the other factors in abortion being considered here. First (Table 3), if the deaths by race are considered, there are almost twice as many white as non-white maternal deaths from abortion in the first five-year period. In the second five-year period, however, the difference between the two is less.

Examination of average ages of white and non-white victims of abortion shows that the white race was a little older at the time of death. The age ranges suggest that the white race is a little less precocious, or to say this another way, the white race is a little later starting and stopping abortions.

Data on the marital status and religion is available only for the group from 1960-1964; and even in this time span, there were two years when the marital status was not consistently recorded. When marital status was recorded the preponderance of abortions occurred in the married group. Of the religions mentioned, Protestants predominated.

TABLE 3
MATERNAL DEATH AND ABORTION
MICHIGAN 1955-1964
GESTATION AND RACE

Gestation	White	Non-white	Total
1955-1959			
10 or less weeks	11	9	20
11-15 weeks	10	6	16
16-20 weeks	6	3	9
more than 20 weeks or undetermined	21	8	29
Total	48	26	74
1960-1964			
10 or less weeks	17	18	35
11-15 weeks	14	10	24
16-20 weeks	20	12	32
more than 20 weeks or undetermined	16	13	29
Total	67	53	120

TABLE 4
MATERNAL DEATH AND ABORTION
MICHIGAN 1955-1964
GESTATION AND PARITY

Gestation	Parity 0	Parity 1-2	Parity 3+	Parity Unknown
1955-1959				
10 or less weeks	2	7	11	0
11-15 weeks	5	3	6	2
16-20 weeks	1	2	2	4
more than 20 weeks or undetermined	4	7	10	8
Total	12	19	29	14
1960-1964				
10 or less weeks	2	7	15	11
11-15 weeks	3	4	10	8
16-20 weeks	3	4	19	5
more than 20 weeks or undetermined	6	11	7	5
Total	14	26	51	29

At least 26 of the 194 patients in the study (Table 4) had no living children. More than 40 percent had more than two living children.

Hemorrhage, infection, and vascular accidents are the three main causes of maternal death associated with abortion. There are several ways of deciding if hemorrhage has occurred (Table 5). One is a recorded hemoglobin value of 9 grams or less. With this guide 39 of the 194 cases with recorded hemoglobins were below 9 grams. Many records did not include a hemoglobin determination.

TABLE 5
MATERNAL DEATH AND ABORTION
MICHIGAN 1955-1964
WITH HEMORRHAGE A FACTOR

Gestation	Hg. below 9 Grams	History of Hemorrhage	Transfused with Blood
1955-1959			
10 or less weeks	4	8	12
11-15 weeks	5	8	12
16-20 weeks	0	5	7
more than 20 weeks or undetermined	10	14	14
Total	19	35	45
1960-1964			
10 or less weeks	9	15	18
11-15 weeks	5	11	13
16-20 weeks	2	8	19
more than 20 weeks or undetermined	4	10	13
Total	20	44	63

The descriptive portion of the case summaries referred to hemorrhage in 79 of the cases reviewed. If only a recorded hemoglobin value and a positive history of hemorrhage are considered, hemorrhage might be a minor factor in abortion. However, another look at the records indicates that 109 of the 194 patients received blood transfusions. One to 35 units (each unit 500 ml.) of blood were

TABLE 6
MATERNAL DEATH AND ABORTION
MICHIGAN 1955-1964

WITH SEPSIS A FACTOR

Gestation 1955-1959	Fever over 100.4°	Interference	Antibiotic Therapy
10 or less weeks	13	12	15
11-15 weeks	9	6	9
16-20 weeks	4	4	4
more than 20 weeks or undetermined	13	11	13
Total	39	33	41
1960-1964			
10 or less weeks	23	19	21
11-15 weeks	17	14	15
16-20 weeks	22	15	21
more than 20 weeks or undetermined	17	11	15
Total	79	59	72

used. Forty-eight (Table 6), or one-fourth of the patients in this study, were dead before medical care was available. By deducting these 48 cases, blood transfusions were given to three-fourths of the patients indicating that hemorrhage is an important consideration in abortion contributing to maternal mortality.

Sepsis was considered to be involved if there was a fever of 100.4 degrees or if antibiotic therapy was used. One-hundred-eighteen had recorded temperatures of 100.4 degrees or more. Fever was absent in some patients with septic shock. One-hundred-thirteen of the patients received antibiotic therapy. In most cases more than one antibiotic was used. Some of the patients with fever who had had no antibiotics, were moribund when fever occurred. Treatment for gas gangrene and tetanus was included more often in the second five years of the study.

Patients from whom cultures were taken were considered as candidates for sepsis. One-hundred-eleven cultures were reported. The sites of origin and the bacteria grown are listed. Coliform bacteria were most common, but the gas-forming bacillus was present in a large and disturbing number. As usual several cultures showed "no growth."

Interference with pregnancy was recorded in the protocol as a part of the history when trauma to the uterus or its contents was noted or in the presence of evidence, such as finding a catheter beside a dead pregnant woman. Ninety-two of the records indicated mechanical interference of some kind by the individual, a physician, or a "friend." The greatest proportion were self-induced. Four were stated to have been done by a "friend," five by a physician, and the remainder were self-inflicted.

Interference was compared in patients with sepsis and vascular collapse. It is obvious that interference could not always be associated with infection — many of the patients did not survive long enough for infection to occur. Is it not interesting how late in pregnancy interference was tried? Over a third of those in the first group waited much longer than most physicians elect to terminate pregnancy from below. A fifth of the patients in the second group were beyond 20 weeks gestation.

Air embolism that resulted from the use of catheters introduced into the uterus produced vascular collapse in 25 percent of the patients in the earlier half and in about 40 percent of those in the second five-year period. Patients who were dead on arrival included those with vascular collapse from air emboli as well as those who had exsanguinated or had some other sudden vascular accident such as massive thrombosis.

Approximately 20 percent (15/74) of the patients in the first five-year series could not be treated by the time they arrived at the hospital, and over 25 percent (33/120) in the second group fell into this category. This is a large group where physicians had no apparent opportunity to help the patient. If these statistics reflect an ominous trend, tomorrow is going to be even worse than today.

HOW WERE THE fatal abortions induced? (Tables 7 and 8) The methods listed cite the rubber catheter most commonly. Oral vodka was used as an aid to the passage of the catheter in

TABLE 7
MATERNAL DEATH AND ABORTION
MICHIGAN 1955-1964

ABORTEFACIENTS

1955-1959	10 or Less Weeks	11-15 Weeks	16-20 Weeks	More Than 20 Weeks or Undetermined	Total
Unknown	5	5	0	3	13
Catheter	5	1	3	1	10
Ear Syringe	1	0	0	0	1
Metal Instrument	0	1	0	0	1
Enema Tip	0	1	0	0	1
Slippery Elm Tent	1	0	0	0	1
Quinine	1	0	1	2	4
"Pills"	0	1	0	0	1
Vodka	0	0	0	1	1
Soap Solution	1	1	0	0	2
$KMnO_4$	1	0	0	0	1
Hemolytic Agent	0	0	0	1	1
"THERAPEUTIC"	2	1	0	0	3
Total	17	11	4	8	40

TABLE 8
MATERNAL DEATH AND ABORTION
MICHIGAN 1955-1964

ABORTEFACIENTS

1960-1964	10 or Less Weeks	11-15 Weeks	16-20 Weeks	More Than 20 Weeks or Undetermined	Total
Unknown	13	6	9	5	33
Catheter	8	3	3	4	18
Metal Instrument	0	0	2	0	2
Knitting Needle	0	0	1	0	1
Trocar	1	0	0	0	1
Polyethylene Tube	0	1	1	0	2
Pencil	0	1	0	0	1
Douche Nozzle	1	0	0	0	1
Glass Straw	0	1	0	0	1
Slippery Elm Tent	0	0	1	0	1
Quinine	0	2	0	0	2
"Pills"	0	1 (Humphrey Tablets)	0	0	1
Castor Oil	0	1	0	0	1
Soap Solution	0	0	1	0	1
Sulfur	0	1	0	0	1
$KMnO_4$	0	0	1	0	1
Douche—Kerosene	0	0	0	1	1
Douche—Vinegar	1	0	0	0	1
Douche—Lysol	1	0	0	0	1
Hot Baths	1	0	0	0	1
Suicide	1	0	0	0	1
"THERAPEUTIC"	1	0	0	0	1
Total	28	17	19	10	74

one patient in the first portion of the study. Abortifacients listed for the 1960-1964 group demonstrate more ingenuity was used or more thorough investigation exposed a greater variety of techniques. Many were used only once. Again, however, the catheter is the leading do-it-yourself method. Douches were used; the "kerosene douche" was a half-gallon, the "vinegar douche" was undiluted acetic acid. The ultimate in abortion was the suicide accomplished by closing the doors to the garage.

How can deaths from criminal abortion be prevented? The first opportunity is through prenatal care. Abortion may be prevented by counseling the patient suspected of considering an abortion. Twenty-one of the 74 patients in the first five-year series of the study made themselves available for prenatal care. Of those who had prenatal care, many had only one visit and most of these were patients with late abortions.

Active treatment must be started early and vigorously in patients with abortions. The number of patients who received blood has already been mentioned. Except for the apparent increased popularity of Chloramphenicol and a decreased enchantment with the Tetracyclines, the antibiotics used in each of the five years studied varied only slightly. The use of Penicillin alone and in combination with Streptomycin is uniform in both groups with about a two-to-one preference for Penicillin.

Vasopressors (Table 9) were used 45 times in the first group of patients. In the second group they were used 111 times. The distribution of the various types of vasopressors is listed. This type of study does not answer the question as to whether vasopressors should be used. It does show, however, that at the time and in the manner they were used, insufficient therapeutic benefit was obtained to prevent death.

Twenty-eight (38%) of the patients in the first group and 47 (39%) of the 120 in the second group had the benefit of consultation. Medical consultation was most commonly sought. The obstetrician-gynecologist was second in popularity.

Dilatation and curettage was done for 16 patients in the first group and 28 in the second group. Eleven patients in each series had a laparotomy. In the first group one case reported indicated traumatic laceration of the bowel and nine perforations of the uterus among the 74 cases. Two-thirds of the uterine perforations occurred before the twelfth week of gestation. In one of these cases perforation of the vagina was also noticed.

IN THE SECOND group there were nine cases of uterine perforation and two vaginal perforations. The incidence of uterine perforation (18/194) of 9 percent is about the same as the 10 percent (9/91) reported from the state of New York.

In the first five-year study, 47 of the 74 cases (64%) had autopsies, and in the second group 106 of the 120 cases (88%) had autopsies. Septicemia was the most common, single cause of death found at autopsy. "Evidence of recent abortion," retained placenta, cervical trauma, endometritis, and other changes to be expected with infection, hemorrhage, and intra-uterine manipulation were

AUTHOR

LEE B. STEVENSON, M.D.

TABLE 9
MATERNAL DEATH AND ABORTION
MICHIGAN 1955-1964

VASOPRESSOR THERAPY—TYPES AND TIMES

1955-1959	10 or Less Weeks	11-15 Weeks	16-20 Weeks	More Than 20 Weeks or Undetermined	Total
Levophed	7	3	0	4	14
Solu-Cortef	3	1	1	3	8
Adrenalin	1	2	0	2	5
Cortisone or Hydrocortisone	1	1	4	2	8
Vasoxyl	1	0	0	1	2
Neo-Synephrine	1	0	2	1	4
Wyamine	0	0	1	0	1
Coramine	1	1	1	0	3
Total	15	8	9	13	45
1960-1964					
Levophed	6	6	13	7	32
Solu-Cortef	6	11	11	3	31
Aramine	2	4	9	4	19
Adrenalin	2	0	1	2	5
Cortisone or Hydrocortisone	1	2	3	4	10
Vasoxyl	0	2	1	0	3
Neo-Synephrine	1	2	3	1	7
Wyamine	1	1	1	1	4
Total	19	28	42	22	111

commonly found. Three cases of ruptured ectopic pregnancy rightfully were included because, in each, attempted criminal abortion was involved. There was only one case of fatal hepatitis secondary to incompatible blood transfusion.

HOW CAN THE public be made to realize and appreciate the serious threat to both life and reproductive health when abortion is attempted?

What can be done to modify the moral, social, legal, and religious impedimenta which foster criminal abortion and its staggering complications?

These questions are much more vital than the sobering statistics reviewed here.

REFERENCE

Kistner, Robert W.: Editorial, *Obst. and Gynec.*, 25; p. 285, 1965.

Original Scientific Article

Correlation of Abnormal Focal EEG Findings With Brain Dysfunction

BY H. P. VELTEN, M.D.
J. MURPHY, R.N.
B. K. BAGCHI, PH.D.
R. C. BASSETT, M.D.
ALL OF LANSING

What is the clinical significance of an abnormal focal pattern in a patient's brain wave recording with or without other associated electrical changes? To give a statistically valid answer, a large number of patients with various disorders of the brain subjected to thorough neurological examination and appropriate diagnostic studies with or without surgical or necropsy findings is needed.

For practical reasons we have created a limited objective and chosen an approach that seems to be more meaningful under such circumstances. Instead of selecting proven intracranial lesions and finding out how often EEG has been of help in localizing them, we have selected those cases which have demonstrated *abnormal* foci or *focal emphasis* in order to determine to what extent the EEG could be correlated with known clinical, radiological, surgical, and autopsy findings. We hoped that by doing this, "false positive" EEG's would be revealed and some answers could be obtained to the question about the diagnostic limitations of EEG as well as its significance. This ideal was not completely fulfilled due to difficulty in gathering correlative data.

MATERIAL AND METHODS

Since the establishment of the EEG Laboratory at Edward W. Sparrow Hospital in 1961, 2,302 patients have been examined electroencephalographically. Three hundred and thirty patients had more than one EEG. From these 2,302 cases 158 have been selected for study since they show some type of focal pattern in addition to other EEG findings.

All available clinical data were collected from the hospital charts or from the attending physician's records; however, a significant number of cases with scanty clinical information could not be used. Twenty-four of our cases were out-patients of which 18 had only a provisional diagnosis without further study in this hospital or any additional information. Known pre-existing convulsive disorders, presumably idiopathic, and cases of recent head-injury with focal findings have been excluded from this study inasmuch as they will form the subject of separate reports.

An 8-channel Model III Grass electroencephalograph with 18 electrode points recently modified to 24 electrode points was used in all cases. Time of recording, exclusive of the time for preparation, ran between 25 and 40 minutes. Electrodes were placed para-sagittally (4 cm.) in prefrontal, motor, parietal, and occipital areas and laterally in anterior temporal, midtemporal, and posterior temporal areas. Scalp-to-scalp linkages in anteroposterior, transverse, lateromedial, and triangulation derivations, and scalp-to-ear linkages of all

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From the Laboratory of Electroencephalography and Section of Neurosurgery, Edward W. Sparrow Hospital, Lansing, Michigan.

TABLE I
TYPES OF EEG FOCAL PATTERN AND DIAGNOSTIC CATEGORIES

		DIAGNOSIS:	TYPE OF EEG FOCUS: Delta*	Theta*	Delta - Theta*	Theta - Delta*	Spike*	TOTAL
A	Neoplasm	Proven	22	3	1	8		34
		Suspected Radiographically	4	1	1	3	1	10
		Suspected Clinically	3	5	2	2		12
B	Thrombosis	Proven	4		1			5
		Suspected Clinically	6			2		8
C	Hemorrhage	Proven	4	1	1			6
		Suspected Clinically	1					1
D	Other Vascular Conditions	Proven	6	1				7
		Suspected Arteriographically	2					2
		Suspected Clinically	17			4		21
E	Atrophy	Proven Pneumoencephalographically	1	1		1	1	4
		Suspected Arteriographically	1					1
		Suspected Clinically	1					1
F	Hydrocephalus	Proven		1		3		4
G	Miscellaneous	Proven or Suspected	19	8	3	11	1	42
		TOTAL	91	21	9	34	3	158

* FOOTNOTE:
Delta waves = ½ cycle to 3.5 cycles per second
Theta waves = 4-7.5 cycles per second
Delta-theta waves = more than 50% delta waves in addition to theta and other waves
Theta-delta waves = more than 50% theta waves in additon to delta and other waves

leads have been utilized in routine and localizing studies. The latter has also involved vertex reference, short triangulations, and other needed montages (2, 3, 5, 6, 8, 10). Photic stimulation using a Grass PS3B Stimulator and hyperventilation technique have been used unless clinically contraindicated.

The median age of these patients was 47 years, ranging from 3 months to 82 years. Nine persons were under 16, and 54 were over 60 years of age. There were 75 females and 83 males.

RESULTS

Table I gives a summary of the correlation between types of EEG focal pattern without indicating other concurrent electrical changes and the clinical diagnostic categories (A to G) of the 158 cases. Thirty-four cases had a neoplastic lesion (A) proven by anatomical findings at surgery or autopsy classified as follows: metastatic (10), glioma (17), meningioma (2), unclassified (2), pituitary (1), neurofibroma (1), hemangioblastoma (1). Multiple mestastases were not considered here.

The 34 tumors were in the following locations including neighboring structures: frontal (12), temporal (11), parieto-occipital (2), occipital (2), corpus callosum (1), pituitary (1), vermis (1), and various deep locations (4).

Twenty-two more cases were also diagnosed as having brain tumor in 10 instances on the basis of radiographic studies and in 12 on the basis of clinical findings alone. (Total 56, See A Table I.)

THIRTEEN CASES were diagnosed as having had thrombosis (B) of one of the major cerebral arteries — 5 by arteriography alone and 8 from clinical findings, surgery or autopsy. Six of 7 intracranial hemorrhages (C) were verified surgically or by autopsy.

There are 30 cases with other types of vascular condition (D), 21 (70%) of which have been diagnosed on the basis of findings other than those obtained through arteriography, surgery or autopsy.

Five of 6 cases of cerebral atrophy (E) were diagnosed by pneumoencephalography or arteriography. In 4 cases of hydrocephalus (F) treated surgically for aqueductal stenosis or other posterior fossa conditions the usual deep level criteria for EEG diagnosis were fulfilled in two (See later.)

Forty-two cases (G) with some type of EEG focus with or without other EEG signs had widely variable clinical diagnoses, i.e., vascular headache, hypertension, toxic confusion, lues, toxemia, hypothyroidism, encephalitis, porphyria, possible abscess, meningitis, pseudo-meniere's syndrome, labyrinthitis, cerebral arteriosclerosis, orbital cellulitis, Korsakoff's syndrome, migraine, ophthalmoplegia, or completely unrelated diagnoses such as: myocardial infarction, vein ligation, alcoholism, and hysteria. The significance of focal EEG findings in these various types of cases (G) is included in the discussion.

It may also be seen in Table I that about 84% (134) of 158 cases had predominantly delta or mixed delta-theta and theta-delta focal patterns which one should expect. (See footnote of Table I for explanation of focal patterns.) The interesting finding is that about 15% (21) had a pure theta focal pattern in proven and unproven cases. This finding in some tumors has been mentioned by one of us, (B.K.B., 5, 6) and others (Cobb 17, 19).

THE POSSIBILITY of obtaining evidence for the absence of a discrete focal lesion of some kind in the upper convexity of the brain and the presence of some type of deep pathophysiological trigger from EEG alone can be deduced in some cases when certain clinical conditions have been ruled out (4, 5, 6, 7, 8, 10, 21). This conditional deep level EEG diagnosis, though not as satisfactory as upper convexity focal diagnosis, was made in 13 of 158 cases; 7 of these cases had proven deep tumors. The remaining 6 had miscellaneous diagnoses.

Table II gives a correlation between results of brain scan and EEG done in 31 cases in relation to other diagnostic methods. In 15 of the 31 cases the scan gave a positive localization. Thirteen scans were negative, and in 3 the findings were equivocal.

IN THESE SAME 31 cases EEG gave correct localization to the lobe or quadrant in 21 cases, correct lateralization in 9, and false lateralization in 1 case. EEG cannot specify the character of the

TABLE II
MERCURY SCAN, EEG, AND DIAGNOSTIC CATEGORIES IN 31 CASES

E G G	A Correct Localization 21									B Correct Lateralization 9						C False Lateralization 1			Total
S C A N	Positive 7			Negative 11			Equivocal 3			Positive 8			Negative 1			Negative 1			31
DIAGNOSIS	Vascular	Neoplastic	Others	Vascular	Neoplastic	Others	Vascular	Neoplastic	Others	Vascular	Neoplastic	Others	Vascular	Neoplastic	Others	Vascular	Neoplastic	Others	
Anatomically Confirmed	2	4		1	3		1			1	4			1			1		18
Radiologically Confirmed	1																		1
Clinical Evidence Only				2	2	3		1	1		2	1							12
Total	3	4		3	5	3	1	1	1	1	6	1		1			1		31

TABLE III
NATURE OF AGREEMENT BETWEEN EEG AND CLINICAL FOCUS*

EEG	CLINICAL FOCUS				
A	B	C	D	E	F
	Good	Fair	No Focus	Total	Uncorroborated
Correct Localization	** 65 (38)	** 5 (1)	** 9 (9)	** 79 (48)	35***
Correct Lateralization	** 20 (14)	** 2 (1)	** 7 (7)	** 29 (22)	
False Lateralization	1	** 1 (1)		** 2 (1)	
Total	** 86 (52)	** 8 (3)	** 16 (16)	*** ** 110 (71)	

Examples (composite): B. Good clinical focus (in a right handed person): Speech difficulty, right handed weakness or sensory loss, right Babinski, right adversive seizure, right Todd's paralysis.

C. Fair clinical focus:
Right papilledema, limitation of motion of one eye, no other findings.
Decreased corneal reflex, suggestion of central facial weakness.

The numbers in brackets refer to proven lesions (by radiography, surgery or autopsy).

* These cases plus 13 cases where deep EEG diagnosis was given total 158.

lesion nor can it indicate that the lesion is of a surgical nature as brain scan may often do.

The scan was positive in 8 out of the proven 13 brain tumor cases and negative in 5, 4 of these having been localized or lateralized by EEG. Five of the 31 cases were vascular lesions verified at surgery or by autopsy. The scan was helpful in 3 and EEG in all 5 cases.

Of the remaining 13 cases (See Total column, Table II), one was a vascular lesion confirmed radiologically and localized by EEG, and 12 were diagnosed only by clinical signs and symptoms as being neoplastic, vascular or other syndromes. In all of these 12 cases EEG gave either localizing or lateralizing information.

Table III demonstrates agreement between clinical and EEG findings in 110 cases in which clinical or anatomical data were available.

IT CAN BE SEEN that the correlative agreement is satisfactory: i.e., out of 110 cases, EEG was helpful in 108 and a clinical focus was shown in 94 cases.

In 71 cases (Table III) with available radiographic or anatomical data, EEG was helpful in 70 cases, 54 of which had a clinical focus.

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Sixteen cases (column D) with no *clinical* focus had EEG focal or lateralized abnormality which was confirmed by radiography, surgery, or autopsy.

Thirty-five cases (column F) remain with EEG localization or lateralization uncorroborated.

DISCUSSION

This report totally ignores many types of electrical changes that are seen in the brain in addition to the focal changes that are emphasized here in connection with various clinical conditions. Sometimes the former are extensive or limited in distribution, and their interpretation is as important as that of a focal change.

A retrospective study of the EEG findings as made here is theoretically useful only when complete correlative clinical and radiographic data are available. In 35 cases with focal EEG patterns out of 158 (22.2%), adequate clinical and laboratory information was lacking. Heterogeneous clinical diagnoses involving extracerebral conditions such as arterial hypertension, porphyria, and drug intoxication which may affect brain function demonstrated focal (9) and other EEG changes. Diffuse intracerebral conditions such as encephalitis and cerebral arteriosclerosis may show EEG foci in addition to generalized changes which only detailed neurological examination may reveal. Meaningful correlation between focal EEG and clinical diagnosis can be established only if the clinical work-up is complete. It is unfortunate that the localizing findings in 35 out of 158 cases cannot be verified. In these cases adequate clinical information was not available. Conversely, at times, cases having focal EEG signs show only vague and nonspecific clinical signs. No definite conclusion can be drawn from these 35 cases. Complete clinical work-ups in these cases would have been of value in this direction.

THIS STUDY CONFIRMS the findings of others that EEG is an important adjunct to the diagnosis of focal intracranial conditions. In this laboratory 98% (108 out of 110, Table III) of the focal EEG findings have been substantiated by other studies. It is shown in the literature that a very high percentage of brain tumors, especially of the upper convexity, can be localized or lateralized with the help of this atraumatic technique (5, 6, 8, 11, 14, 15, 17, 19, 20, 21, 22, 23, 24), although

EEG is unable to distinguish between tumor, abscess, or other focal conditions.

SUMMARY

One-hundred-and-fifty-eight EEG's with focal findings were selected from a total of 2,302 records taken at Edward W. Sparrow Hospital between 8-23-61 and 6-30-66. EEG foci were correlated with clinical, surgical, and other diagnostic findings.

Despite the fact that in 22% of the cases, such a correlation was not possible for lack of clinical data, our investigation shows that wherever such data was available the correlation was positive in all but a minimal percentage of cases (2 out of 123).

It seems clear that EEG should be used more frequently as an adjunct to diagnosis when brain disorder is suspected.

BIBLIOGRAPHY

1. Bagchi, B. K. and Bassett, R. C. Localization of intracranial lesions by electroencephalography. Preliminary Report. *Univ. Hosp. Bull.*, Ann Arbor, 1943, 9:86-87.
2. Bagchi, B. K. and Bassett, R. C. Some additional electroencephalographic techniques for the localization of intracranial lesions. *J. Neurosurg.*, 1947, 4:348-369.
3. Bagchi, B. K., Bassett, R. C. and Peet, M. M. Three-dimensional scheme of electroencephalographic localization of intracranial neoplasms. *Tr. Am. Neuro. Ass.*, 1947, 72:101-107.
4. Bagchi, B. K., Lam, R. L., Kooi, K. A. and Bassett, R. C. EEG findings in posterior fossa tumors. *Electroenceph. clin. Neurophysiol.*, 1952, 4:23-40.
5. Bagchi, B. K. EEG localization of intracranial tumors. In *Correlative Neurosurgery* by Kahn, E. A., Bassett, R. C., Schneider, R. C., Crosby, E. C. Charles C. Thomas, Springfield, Ill. 1955a, Chap. III (pp. 18-53).
6. Bagchi, B. K. Preoperative electroencephalographic localization of brain tumors. In T. Shedlovsky (Ed.), *Symposium on Electrochemistry in Biology and Medicine.* Pub. for Electrochemical Soc. by John Wiley & Sons, Inc., New York, 1955b, Chap. 18 (pp. 331-351).
7. Bagchi, B. K., Kooi, K. A., Selving, B. T. and Calhoun, H. D. Subtentorial tumors and other lesions. An electroencephalographic study of 121 cases. *Electroenceph. clin. Neurophysiol.*, 1961, 13:180-192.
8. Bagchi, B. K. and Kooi, K. A. Electroencephalography and brain tumors. (Technique and summary of findings on 728 cases). *The Univ. of Mich. Bull.*, Ann Arbor, 1961b, 27:50-60.
9. Bagchi, B. K., Robinson, William D., Bauer, Jere M. EEG changes in a case of vitamin D intoxication. *University of Michigan Bulletin,* 23:439-445, 1957.
10. Bassett, R. C., and Bagchi, B. K. Intracranial neoplasm localized electroencephalographically by the use of a three-dimensional scheme. *J. Neurosurg.*, 1948, 5:298-306.
11. Bekhtereva, N. P. *Biopotentials of cerebral hemispheres in brain tumors.* Transl. from the Russian by Basil Haigh. Pref. by Percival Bailey. The International Behavioral Sciences Series (Ed. Joseph Wortis). Consultant's Bureau, New York 1962, 183p.
12. Berger, H. Uber das Elektrenkephalogramm des Menschen. VII. *Arch. f. Psychiat u Nervenkr.*, 1933, 100:301-320.
13. Case, T. J. and Bucy, P. C. Localization of cerebral lesions by EEG. *J. Neurophysiol.*, 1938, 1:245-261.
14. Ellingson, R. J. and Lundy, B. W. EEG of patients suspected of having metastatie lesions of the brain. *Cancer* (Philad.) 1962, 15:1138-1141.
15. Gibbs, F. A., Munro, D., and Wegner, W. R. A standard electroencephalographic technique for the localization of gross intracranial lesions. *New England J. Med.*, 1941, 225:279-282.
16. Hasegawa, Kazuo and Aird, R. B. An EEG study of deep-seated cerebral and subtentorial lesions in comparison with cortical lesions. *Electroenceph. clin. Neurophysiol.*, 1963, 15:934-946.
17. Hill, Denis and Parr, Geoffrey (Eds.) *Electroencephalography,* The Macmillan Company, New York, 1963, 509 p.
18. *EEG Literature of the World and EEG Society Proceedings to 1965.* Kwick Index. Compiled by R. G. Bickford, J. L. Jacobson and D. Langworthy. Elsevier Pub. Co., New York, 1965, p581.
19. Magnus, O., Storm Van Leeuwen, W. and Cobb, W. A. Eds. *Electroencephalography and cerebral tumors. Electroenceph. clin. Neurophysiol.*, Suppl. 19, Elsevier Publishing Co. Amsterdam 1961, 250p.
20. Peiffer, J. Brain tumors: Correlation of the EEG with autopsy and histological findings. *Arch. Psychiat. Nervenkr.*, 1953, 190:26-48.
21. Small, J. G., Bagchi, B. K. and Kooi, K. A. Electroclinical profile of 117 deep cerebral tumors. *Electroenceph. clin. Neurophysiol.*, 1961. 13:193-207.
22. Van der Drift, J. H. A. *The significance of EEG for the diagnosis and localization of cerebral tumors.* H. E. Stenfert Kroese N. V., Leiden 1957. 135p.
23. Walter, W. G. The location of cerebral tumors by electroencephalography. *Lancet.* 1936. 2:305-308.
24. Williams, D. and Gibbs, F. A. Localization of intracranial lesions by EEG. *Arch. Neurol. Psych.*, 1939. 41:519-534.

Original Scientific Article

The Ocular Complications Of Steroid Therapy

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DETROIT

ABSTRACT — The knowledge of the association between systemic and local corticosteroid therapy and iotrogenic ocular disease is important to every practitioner. Chief among these effects are the worsening of herpes simplex keratitis, the occurrence of fungus keratitis, the production of glaucoma, cataracts, and papilledema.

Since the introduction of cortisone by Hench and Kendall in 1949[1] virtually no segment of the medical world has failed to find a place for the use of local and systemic corticosteroids in the treatment of inflammatory and allergic disease. Concomitant with the increased utilization of these compounds new iatrogenic disease states have occurred.

While many of the undesirable side effects of corticosteroid therapy became apparent shortly after the initial discovery, it has taken over a decade for the more subtle toxicities to become manifest. There have been several recent important developments in the relationship between ocular disease and the use of corticosteroid compounds.

This report will compile and review all of the currently known ophthalmic complications resulting from the use of local and systemic corticosteroid therapy.

The discussion will follow anatomic guidelines.

I. CONJUNCTIVA

Major iatrogenic disease of the conjunctiva has not been reported during the use of local or systemic corticosteroids. This mucous membrane, as with mucous membranes elsewhere in the body has shown an increase in the number of bacterial and fungal infections during prolonged local corticosteroid therapy. Fortunately, with few exceptions, these infections are easily controlled and are without significant sequellae.

II. CORNEA

Two major corneal problems have arisen with the use of local corticosteroid therapy. Perhaps the best known entity is the result of the inadvertent treatment of herpes simplex (dendritic) keratitis (figure 1) with corticosteroids. Except in rare instances this virus is limited to the corneal epithelium. Epithelial debridement with and without chemical cautery generally resulted in complete cure and more recently the introduction of idoxyuridine (IDU) has improved treatment results. Therapy with local corticosteroids, however, permits the virus to penetrate Bowman's membrane into the stroma which results in permanent

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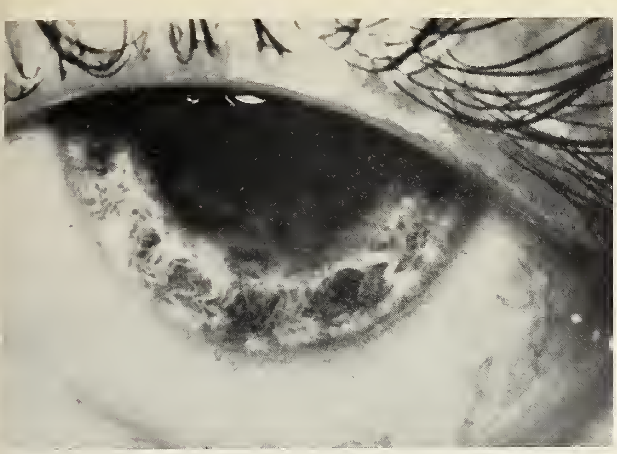

Figure 1: Classic dendritic figure seen in the lower one-half of cornea in patient with herpes simplex keratitis.

corneal scarring. When treatment is continued perforation of the globe may result. Certainly herpetic keratitis is a definite and fortunately well-known contraindication to the use of local corticosteroids.

Fungus keratitis was practically unknown prior to the introduction of cortisone. With the increased use of local compounds, normally saprophytic fungi have caused permanent scarring and perforation of globes due to deeply infiltrative corneal ulcers. The frequent employment of local steroid-antibiotic combinations has complicated the treatment of this keratitis and has further increased the incidence of corneal fungus disease (figure 2).

III. ANTERIOR CHAMBER

The anterior chamber is the most convenient anatomic component in which to consider the most recently uncovered and possibly the most significant complication of local and systemic corticosteroid therapy — an increase in intraocular pressure, "steroid induced glaucoma."

In 1961[2] a retrospective statistical study suggested a relationship between elevated intraocular pressure (IOP) and systemic corticosteroid therapy. European investigators[3] and later several groups of American clinicians[4, 5, 6] confirmed this initial impression and more importantly, pointed out that the use of local corticosteroid resulted in a definite rise in intraocular pressure in nearly one-third of the population when used in normal therapeutic levels (eg. qid/for four weeks). It was also noted that relatives of glaucoma patients responded with a rise in pressure in virtually all cases.

These findings have led to a genetic theory of glaucoma whereby "carriers" of the gene for glaucoma can be detected by noting the response to this short term corticosteroid therapy.

Beyond the academic significance of these exciting findings is the practical importance of the need for close monitoring of the intraocular pressure in patients receiving prolonged local or systemic corticosteroid therapy.

IV. IRIS AND CILIARY BODY

Although no permanent deleterious effect has been found on either the iris or ciliary body, two interesting observations related to these structures are worth noting. A relative mydriasis occurs after several weeks of local corticosteroid therapy while a decrease in the amount of accomodation is also noted. Both of these phenomena disapeear shortly after the discontinuation of treatment.

V. THE LENS

In 1960 investigators from the National Institute of Health[7] presented a group of patients in whom the association between well circumscribed posterior subcapsular cataracts (PSC) and sustained, high dosage systemic corticosteroid therapy was

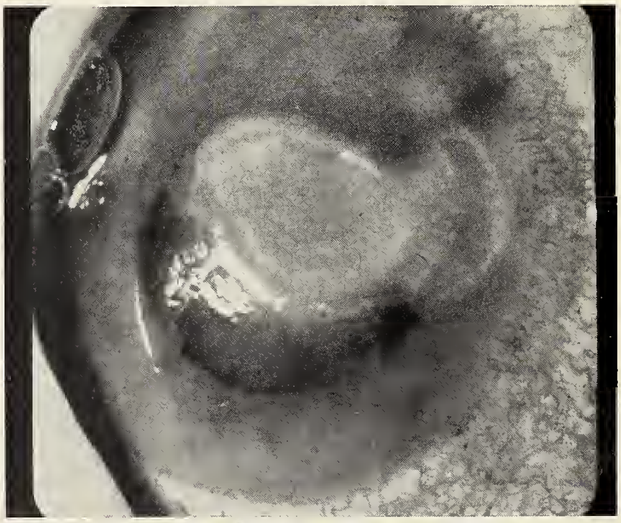

Figure 2: Large, central corneal ulcer with infiltrate, curled borders and surrounding corneal epithelial edema in patient with fungus keratitis.

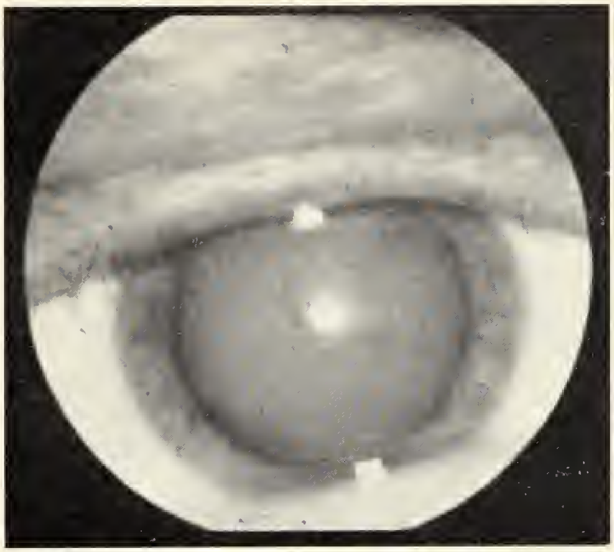

Figure 3: Patient with rheumatoid arthritis who had received high dosages of systemic corticosteroids for six years and who demonstrates a posterior subcapsular cataract with transillumination.

noted. Several detailed studies refuting this relationship soon appeared in the American and Canadian literature.[8, 9, 10, 11] Further cases by this group from the National Institute of Health[12] and an additional series from the University of Michigan Medical Center[13] have more recently been followed by several other positive, correlative reports and have more firmly established this as a specific entity.

The lens change has now been seen in patients receiving systemic corticosteroids for a wide variety of disorders including rheumatoid arthritis, (figure 3) lupus erythematosis, nephrosis, bronchial asthma, and dermatomyositis. In addition, several reports have noted the association between these cataracts and local corticosteroid administration.

The accompanying figures show the opthalmoscopic and biomicroscopic view of these cataracts (figure 4). Although few of these opacities have advanced to the point where cataract extraction has been necessary, significant visual reduction is not unusual in these patients.

VI. OPTIC NERVE

Pseudotumor cerebri is manifested by intracranial hypertension and papilledema (figure 5) in patients with normal or small ventricular systems. The recent literature is dotted with case reports concerned with this problem in youngsters averaging eight years and receiving systemic treatment for a number of disorders (nephrosis, asthma, eczema) over a period of months to years. The syndrome, associated with headaches, nausea, vomiting, and diplopia occurs after a change of dosage of type of steroid and can usually be controlled by increasing the dosage of the drug and

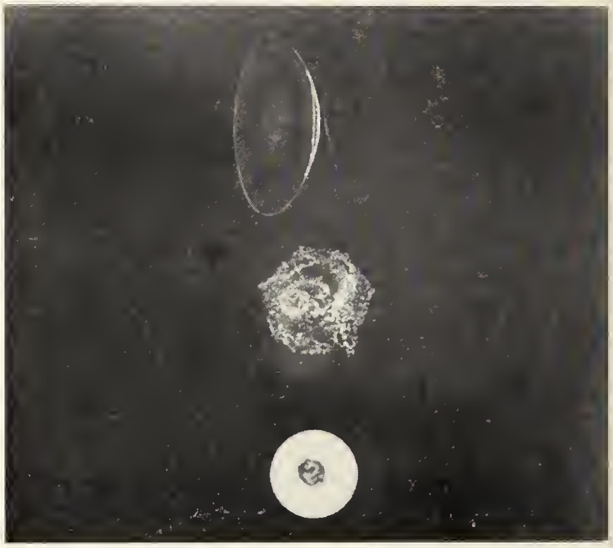

Figure 4: Three views of the posterior subcapsular cataracts associated with steroid administration.

Top: Cross section of lens showing the posterior position of the opacity.

Middle: Detailed as viewed from the biomicroscope.

Bottom: Transilluminated view seen with the ophthalmoscope.

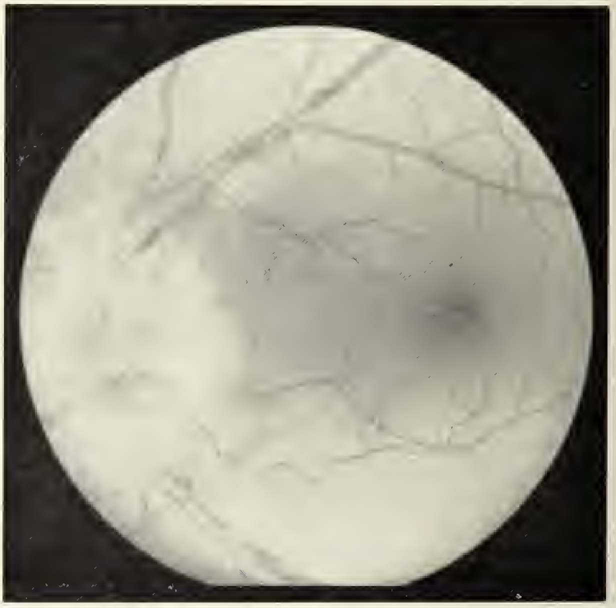

Figure 5: Papilledema in patient receiving systemic corticosteroids for nephrosis.

them slowly reducing the steroid to a maintenence level just sufficient to control the primary disorder. The papilledema subsides over a period of weeks.[14]

SUMMARY AND CONCLUSIONS

Rather than a list of conclusions, this section should more probably be titled "commencement," for we have only started, not concluded, any discussion concerning the side effect of corticosteroid therapy. These few complications are only the beginning and while they are sufficient to warrant the suggestion that the clinician be "judicious" in the use of these potent agents, the list is bound to grow as physicians continue to utilize corticosteroids.

This article has drawn attention to the significant known ocular side effects of systemic and local corticosteroid therapy. Chief among these effects are the worsening of herpes simplex keratitis, the occurrence of fungus keratitis, the production of glaucoma and cataracts and their association with increased intracranial pressure and papilledema.

REFERENCES

1. Hench, et al: Effect of Hormone of Adrenal Cortex and Pituitary Adrenocorticotropic Hormone on Rheumatoid Arthritis; Preliminary Report. *Ann. Rheum. Dis.*, 1949: 8:97-104.
2. Bernstein, H. N. & Schwartz, B.: Effects of Long Term Systemic Steroids on Ocular Pressure & Tonographic Values. *Arch. Ophthal.*, 68:742, 1962.
3. Francois, J.: Cortisone et Tension Oculaire. *Ann. Oculist*, 187:805, 1954.
4. Becker, B. & Mills, D. W.: Corticosteroids and Intraocular Pressure. *Arch. Ophthal.*, 70:500, 1963.
5. Nicholas, J. P.: Topical Corticosteroids & Aqueous Humor Dynamics. *Arch. Ophthal.*, 72:189-197 (August), 1964.
6. Armaly, M. F.: Effect of Corticosteroids on Intraocular Pressure & Fluid Dynamics: 1. Effect of Dexamethasone on Normal Eye. *Arch. Ophthal.*, 70:482, 1963.
7. Black, R. L. et al: Posterior Subcapsular Cataracts Induced By Corticosteroids in Patients With Rheumatoid Arthritis, *JAMA*, 174:166-171, 1960.
8. Gordon, D. M., Kammerer, W. H. & Freyberg, R. H.: Examination For Posterior Subcapsular Cataracts, *JAMA*, 175:127-129, 1961.
9. Abrahamson, I. A., Jr., & Abrahamson, I. A., Sr.: Cataracta Complicata & Corticosteroids, *Eye, Ear, Nose & Throat Monthly*. 40:266-268, 1961.
10. Pfahl, S. B. et al: Relationship of Steroid Therapy and Cataracts in Patients With Rheumatoid Arthritis, *Amer. J. Ophthal.*, 52:831-839, 1961.
11. Toogood, J. H. et al: Posterior Subcapsular Cataracts as Complication of Adrenocortic Steroid Therapy, *Cand. Med. Ass'n. J.*, 86:48-56, 1962.
12. Oglesby, R. B. et al: Cataracts in Patients With Rheumatic Diseases, *Arch. Ophthal.*, 66:625-630, 1961.
13. Giles, C. L. et al: The Association of Cataract Formation and Systemic Corticosteroid Therapy. *JAMA*, 182:719-722 (Nov. 17), 1962.
14. Walker, A. E. and Adamkiewicz, J. J.: Pseudotumor Cerebri Associated With Prolonged Cortico-Steroid Therapy, 188: 779-784 (June 1), 1964.

Original Scientific Article

OIT as a Routine Neuro-Psychiatric Screening Test

BY H. C. TIEN, M.D.
G. D. CLARK, M.D.
BOTH OF LANSING

Abstract: The Organic Integrity Test (OIT), a simple three-minute color-form perception device for detecting brain damage or schizophrenia, was designed by the senior author at Ypsilanti State Hospital, Michigan, in 1959. The OIT has been confirmed in Europe and America as a reliable diagnostic instrument. This study presents the OIT as a routine test in pre-employment medical examinations at General Motors.

The Organic Integrity Test (OIT) was designed to measure organic brain deficit due to any brain disease. The OIT has proven to be reliable and valid both in Europe and America as a quick and efficient diagnostic aid for physicians to rule in an organic brain disease or a paranoid schizophrenic reaction.

The OIT can be readily applied for mass screening in psychiatric clinics, schools, hospitals, or as a routine neuro-psychiatric test in the office of a general practicitioner. The OIT is applied in this pilot study at General Motors as a routine neuro-psychiatric screening test in pre-employment medical work-up.

THE PRODUCTIVITY potential of any individual is a function of his physical and mental health. Physical disabilities are easily detected by objective physical examinations, X-ray studies and various laboratory tests. However, mental disability is difficult to demonstrate objectively. Under most favorable circumstances, it can only be subjectively assessed in pre-employment medical examinations for the lack of a quick inexpensive, objective, neuro-psychiatric screening test, comparable, say, to a routine chest X-ray. Complete clinical neuro-psychiatric evaluations are obviously not feasible in a large industrial concern hiring workers by the hundreds.

An objective neuro-psychiatric screening test, quick, efficient and reliable, would answer this dilemma. In 1960, such a test has shown promise in the form of the OIT, published in "The A.M.A. Archives of General Psychiatry," entitled *Organic Integrity Test (OIT) A Quick Diagnostic Aid to Rule In Organic Brain Diseases.*[1] The OIT can be given to pre-employment applicants with a testing and scoring time of only 3 minutes. An OIT value of less than 50 would indicate that an applicant may be suffering from psychosis, organic brain syndrome and/or definite mental deficiency. With the discovery of the OIT phenomenon and a simple diagnostic technique, routine neuro-psychiatric screening has now become a definite possibility.

THE ORGANIC INTEGRITY TEST

The OIT consists of 10 sets of 3 pictures per set, with one free single and a combined double. For

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WHICH TWO PICTURES ARE MOST ALIKE?

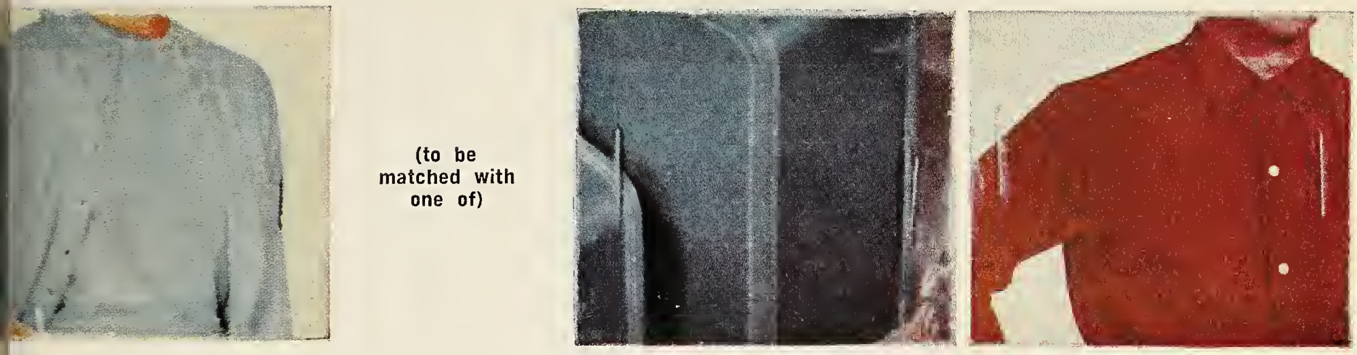


Figure 1 — **ORGANIC INTEGRITY TEST (OIT)**

ses by:
Normal: Matches blue sweater with red shirt. (Form response)
Organic: Matches blue sweater with blue suitcase. (Chromaphilic response)
Schizophrenic: Matches blue sweater with blue suitcase. (Chromaphilic response)

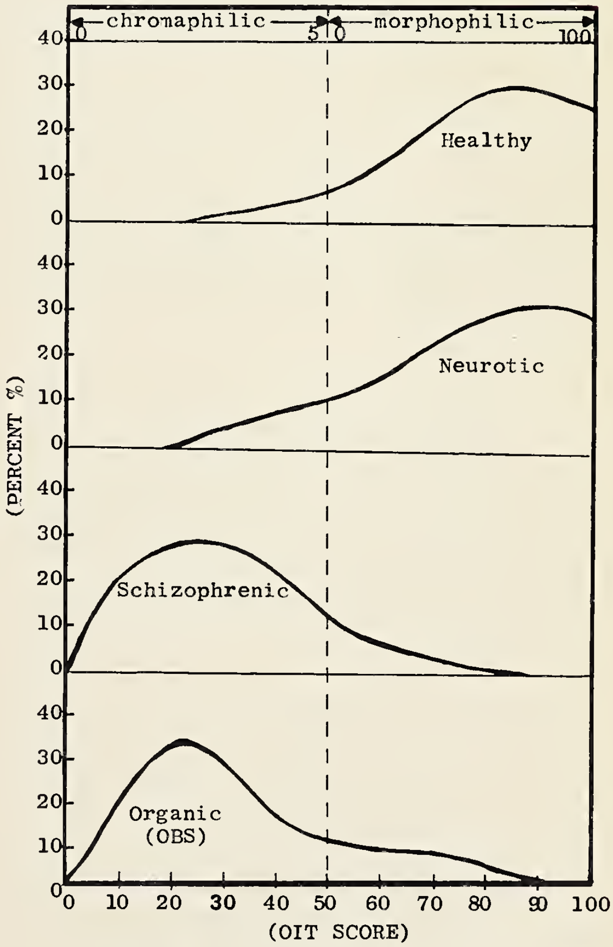
example, a free single showing a picture of a *blue sweater* is to be matched with either a red *shirt* or a *blue* suitcase. (Figure 1)

The subject, seated and facing the examiner is then asked, *"Which two pictures are most alike?"* This question may be repeated several times, but no further explanation should be offered. The OIT score for 10 correct matchings is 100. For each incorrect matching the subject loses a number of points. The correct matching is based on form-perception as stated in Tien's theory of chromaphilia, explainable in terms of the Jacksonian concept of dissolution[2]: Form-perception is a function of the intact central nervous system. With brain damage or dysfunction, this form-dominated perception (morphophilism) is reduced to a lower level of CNS functioning of color-dominated perception (chromaphilia) as shown on the OIT. (e.g., instead of matching the blue *sweater* with the red *shirt,* the brain-damaged individual matches the blue *sweater* with the *blue* suitcase.)

The validity and reliability of the OIT were independently confirmed by Astrom[3] of Sweden (1963), Engelsmann[4] and Drdkova of Czechoslovakia (1964) and furthermore, Tien[5] and Williams confirmed with 1,300 students that OIT proved to be equally valid and reliable for testing children (1965). (See Table No. 1)

Astrom found that the OIT can detect organic brain dysfunction or damage, which a complete neuro-psychiatric examination, plus the traditional psychometric tests for brain damage often fail to

FREQUENCY DISTRIBUTION OF OIT SCORE
(Adult)



(Tien, 1960, Engelsmann & Drdkova, 1964)
Figure 2

AUTHOR

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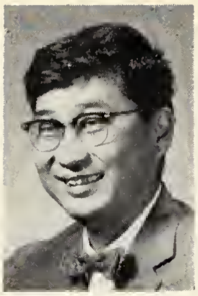

disclose. Engelsmann has stated that the OIT as a quick diagnostic aid to rule in organic brain diseases is clinically accepted. The OIT can separate significantly the healthy subjects from one suffering from organic brain damage, e.g., due to chronic alcoholism or from organic brain dysfunction, e.g., due to chronic schizophrenia. In fact, 98% of the healthy subjects scored an OIT value above 50, whereas about 90% of the brain-deficit subjects scored an OIT value below 50. (See Figure 2)

Figure 2 shows unmistakably that schizophrenia is a disease, similar to organic brain syndrome (OBS), but unlike neurosis. Tien[1] theorized in 1960 on the basis of the OIT data that schizophrenia is a type of organic brain dysfunction and organic brain dysfunction is a type of brain damage. Stated in a medical maxim: brain damage is irreversible brain dysfunction and brain dysfunction is reversible brain damage. There lies probably the secret of schizophrenia as objectively revealed by the OIT.

METHOD AND PROCEDURE

The plant physician (Clark) evaluated 342 applicants with the OIT at General Motors, in the course of hiring new workers for semi-skilled and unskilled employment. The applicant is interviewed by a member of the General Motors Personnel Department where he is then referred to the Medical Department for complete medical examination. The medical examination, in addition to the routine physical, includes various laboratory tests with a chest X-ray, urinalysis, sight-screener test, audiogram, and any additional X-ray studies whenever indicated.

In general, an applicant is rejected for employment on a medical basis if he has any disability that would interfere with his work potential in the factory. In this study, we administered the OIT together with an IQ test (KET) and a neurotic index (MMS) simultaneously to all applicants to assess their average intelligence and anxiety level in relation to organic brain integrity. KET[6] is an intelligence test based on verbal information, with 10 questions such as *Why does the moon look larger than the stars?* And MMS is a modified medical questionnaire similar to the Maudsley[7] scale with a built-in lie-score to determine subjective anxiety with 50 yes-no questions, such as *Did you ever get short of breath without having done heavy work?*

All 342 applicants were hired in compliance with then existing policies of hiring workers by General Motors, regardless of test results on the OIT, MMS or KET. Less than 30 days after the pre-employment medical examination and the above psychiatric screening, 32 workers lost their jobs as unreliable workers. (See Table 1) The unreliable worker is defined as follows: (a) walking off job without notification, (b) failing to report to work, (c) unsatisfactory job performance,

Table 1
The OIT Diagnostic Chart (Adult & Children)
(Interpolated)

OIT Score		**Chromaphilic**	**Borderline Chromaphilic**	**Normal**	**Average**
Grade	**Age**	**Range**	**Range**	**Range**	**Score**
Adult	18+	0-50	51-60	61-100	82
12th	17	0-40	41-52	53-100	77
11th	16	0-34	35-46	47-100	73
10th	15	0-31	32-39	40-100	70
9th	14	0-27	28-33	34-100	69
8th	13	0-24	25-31	32-100	68
7th	12	0-23	24-29	30-100	67
6th	11	0-22	23-28	29-100	66
5th	10	0-21	22-26	27-100	64
4th	9	0-19	20-25	26-100	63
3rd	8	0-17	18-22	23-100	58
2nd	7	0-16	17-19	20-100	50
1st	6	0-13	16-18	10-100	44
KG	5	0-12	13-16	17-100	34
OIT Diagnosis		Chromaphilia	Borderline Chromaphilia	Morphophilic	Average
Diagnostic Implications		Indicative of Organic Brain Syndrome, mental retardation or psychosis, etc.	Suggestive of chromaphilia & warrants OIT retesting.	Normal form perception for age group	Average form perception
Clinical Correlation		The OIT is to be used as part of a psychological test battery and/or in conjunction with clinical history as a differential diagnostic point in the same manner as a white blood count, (WBC), blood pressure, (BP), or a routine chest X-ray is used.			

Table No. 2

UNRELIABLE WORKERS

No.	Name	Age	OIT	MMS	KET	Clinical Diagnosis or Comments
1	JWA	19	95	32	97	Quit, walked off job, moved
2	LLA	18	65	15	99	Went back to school
3	RJA	20	(24)	100	81	Failed to report
4	DLB	18	78	25	91	Unable to do work available
5	TAB	18	55	33	93	Released-falsification of records
6	LJB	20	89	10	100	Released-unsatisfactory job performance
7	RWB	20	73	26	83	Quit-didn't like work, too much tension
8	WC	23	(13)	17	91	Paranoid schizophrenia-released
9	JAC	20	83	33	81	Quit-dissatisfied with work
10	LND	19	88	24	93	Quit-didn't feel he could do the work
11	LJD	21	83	50	80	Released for Psychoneurosis
12	TED	23	70	30	80	Released-unable to perform work available
13	LLF	19	91	31	68	Absenteeism due to family illness
14	RG	20	(24)	17	97	Not performing satisfactorily-released
15	MH	20	56	12	85	Quit-didn't like the work
16	DLH	21	85	20	93	Terminated-falsification of records
17	CEI	18	68	19	68	Quit-didn't come in, left for college
18	MAK	21	91	30	97	Discharged-unsatisfactory work
19	JLM	23	59	12	100	Didn't report-continued working previous job
20	MR	20	71	15	93	Quit-didn't like work
21	RER	23	(34)	16	95	Quit to join the Marines
22	LS	18	(13)	20	93	Paranoid Schizophrenia-released
23	RS	34	64	19	83	Quit-dissatisfied with job
24	CS	22	69	37	85	Released-absenteeism
25	KS	20	94	27	97	Discharged-walked off job
26	RT	23	88	5	97	Quit-didn't show up, emergency appendectomy
27	RT	21	85	17	91	Quit-due to disagreement with foreman
28	VT	27	55	2	83	Quit-doesn't like the job
29	DFW	18	55	21	93	Discharged-unsatisfactory performance
30	VW	42	(33)	7	97	Alcoholic, CNS degeneration-released
31	JW	23	100	17	83	Quit-doesn't like the job
32	PV	18	75	21	85	Terminated-absenteeism

Footnote: ( ) = Abnormal OIT score, i.e., below 50.

fired by foreman, (d) overt confused and disoriented behavior on the job and (e) falsifying records. Thus, these 32 unreliable workers formed our unreliable workers group to be statistically studied and compared with the average workers group consisting of all the 342 applicants hired originally at the onset of this project. (See Table 2)

RESULTS

We may summarize our statistical results as follows: 1. We accept the hypothesis that the average workers group and the unreliable workers group scored the same neurotic index on MMS at 99% confidence level. Conclusion: There is no significant difference between the average worker and the unreliable worker on the level of anxiety as measured on MMS. (See Table 3)

2. We reject the hypothesis that the average workers group and the unreliable workers group are scoring on the average, slightly higher IQ on KET at 99% confidence level. Conclusion: there is significant difference between the average worker and the unreliable worker in so far as intelligence is concerned. (See Table 4)

3. And, we reject the hypothesis, at the 99% confidence level that the OIT scores on the average workers group are not different from those of the unreliable workers group. Conclusion: we can be practically certain that the unreliable worker scores a significantly lower OIT value than the average worker. The OIT is a useful neuro-psychiatric screening test to spot organic brain deficit in the pre-employment medical examination. (See Table 5)

DISCUSSION

The OIT is a simple two-choice decision test based on intact form-perception. A low OIT score may be obtained for other reasons than organic brain damage or organic brain dysfunction (psychosis). False positives can be obtained from inattention, malingering, misunderstanding of test instructions and others. False negatives can also

Table No. 3

Significance Test at 99% Confidence Limits on MMS (Neurotic Index)

	Group Size N	Means $\overline{X}$	Standard Deviations SD	99% Confidence Limits
1. The Unreliable Workers	32	23.9	16.8	$\overline{X}_2-\overline{X}_1$ = -9.33 to +6.33
2. The Reliable Workers	342	22.4	10.8	The confidence limits do include zero (0) between them. Conclusion: No significant difference.

Table No. 4

Significance Test at 99% Confidence Limits on KET (IQ Evaluation)

	Group Size N	Means $\overline{X}$	Standard Deviations SD	99% Confidence Limits
1. The Unreliable Workers	32	89.6	8.3	$\overline{X}_2-\overline{X}_1$ = +0.86 to +7.93
2. The Average Workers	342	94.0	3.0	No zero (0) is included. Conclusion: Significant difference. The unreliable worker scores a lower IQ on the average.

Table No. 5

Significance Test at 99% Confidence Limits on OIT (Neuro-psychiatric Screening)

	Group Size N	Means $\overline{X}$	Standard Deviations SD	99% Confidence Limits
1. The Unreliable Workers	32	64	26	$\overline{X}_2-\overline{X}_1$ = +2.18 to +25.82
2. The Average Workers	342	78	15	No zero (0) is included. Conclusion: significant difference. The unreliable worker scores a lower OIT (brain function) on the average.

occur in guessing or random choice. However, the problem of false negatives and false positives will remain with us in any objective test we can design, even in such a test as Kahn test for syphilis.

The OIT cannot be relied upon by itself as a predictor of productivity of a worker, for even if a low OIT score is valid and reliable as indicative of organic brain damage or schizophrenia in such a disabled worker, who may be able to perform reasonably well in some specific or sheltered task. No isolated test score, including the OIT should be used as diagnostic of a disease entity without the benefit of total medical history and clinical work-up. A potential employee should, therefore, not be eliminated from being hired on the strength of a single test such as the OIT.

Statistically, this study needs further strong support and follow-up studies. Better sampling surveys to screen pre-employment employees with the OIT are needed in various employment situations other than at the General Motors. The number of unreliable workers in this study is rather small and inadequate for broad generalizations, even though the OIT has been confirmed to be both reliable and valid as a test, indicative of organic brain syndrome and schizophrenic psychosis in the severely deteriorated patients of a Michigan State Hospital.

The medical responsibility of the borderline workers or patients in employment or return-to-work decision remains always with the individual physician.

The relationship of the OIT[2] to Rorschach[8] has been discussed elsewhere. Good form perception, as shown with the OIT in recognizing patterns or designs is of fundamental importance in handling machinery and tools. The theory of productivity, based on the OIT is related to good form perception, however, the OIT cannot exclude other factors, such as intelligence and anxiety. Neurotic conflicts or high level anxiety may reduce productivity.

However, organic brain integrity is of primary importance in spotting the unreliable worker due to organic brain damage or dysfunction, whereas anxiety level is not statistically significant as found in our present project. But intelligence as measured by the KET is significantly lower in the unreliable workers group. Of course, high level intelligence is not necessary for semi-skilled and unskilled work, and it may even be counter-productive on the assembly line, but intelligence should be within normal limits.

This General Motors study has shown that the OIT as a measure of organic brain integrity is significantly lower in the unreliable workers group. This means the unreliable workers, on the average, have greater organic brain deficit or dysfunction.

We succeeded on this survey of 32 unreliable workers to spot with the OIT at least two cases of paranoid schizophrenia, one case of chronic alcoholism with brain damage. On the basis of this survey it may be helpful that any applicant scoring less than 50 on the routine OIT should have a repeat OIT later, possibly a more detailed neuro-psychiatric consultation prior to employment, at the discretion of the pre-employment examining physician.

SUMMARY

The Organic Integrity Test (OIT) was designed by Tien in 1960 for physicians to screen patients for brain damage or dysfunction. The OIT can be given *and* scored in three (3) minutes. The validity and reliability of the OIT were independently confirmed by Astrom of Sweden, Engelsmann and Drdkova of Czechoslovakia. In this study the OIT was given to 312 applicants as part of a pre-employment routine medical examination at General Motors.

The General Motors results show that the OIT can be given successfully en masse as an efficient, inexpensive neuro-psychiatric screening test to spot mental disabilities, much like the routine use of chest X-ray to screen pulmonary diseases. However, the final clinical diagnosis of mental health or disease in any given patient must remain the ultimate responsibility of the individual physician. ☐

REFERENCES

1. Tien, H. C.; Organic Integrity Test: *Archives of General Psychiatry,* July 1960, Vol. 3, pp. 43-52.

2. Tien, H. C.; and Clark, G. D.; Organic Integrity Test Confirmed: *Am. J. of Psychiatry,* Vol. 121, #3, September 1964.

3. Astrom, J.; Organic Integrity Test in Clinical Use: *Nord Psykiat.* T. 2:160-169, 1963.

4. Engelsmann, F., and Drdkova, S.; Organic Integrity Test: *Czechoslovak Psychology,* Vol. 8, #2, 1964.

5. Tien, H. C., and Williams, M. W.; Organic Integrity Test in Children: *Archives of General Psychiatry,* February 1965, Vol. 12, pp. 159-165.

6. Kent, Grace H.; Kent Emergency Test: *Journal of Psychology* 1942, 13, 141-164.

7. Eysenck, H. J.; *Sense and Nonsense in Psychology,* Bungay, Suffolk: Richard Clay & Company, Ltd., 1958.

8. Rorschach, Hermann; *Psychodiagnostics,* 5th Ed. (Lemkau and Kronenberg) New York: Grune & Stratton, 1951.

Original Scientific Article

Community Psychiatry And the Future State Hospital

BY HANS VON BRAUCHITSCH, M.D.
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ABSTRACT: Current trends of admission to and hospitalization in state mental hospitals are investigated. Communities with adequate mental health facilities send a relatively large share of chronic, long-term cases to state hospitals; whereas, geographical vicinity apparently encourages hospitalization of short-term cases. As community mental health programs become more effective, it can be expected that a higher proportion of severely ill, "incurable" patients will reside in state hospitals. It is suggested to start vigorous planning of long-term custodial and rehabilitation programs.

INTRODUCTION

Community psychiatry has rapidly taken the lead in recent developments of mental health programs. There can be little doubt that this movement, as it progresses, will exert a deep influence on the planning of new psychiatric facilities as well as on the reshaping of the conventional ones.

That state hospitals will entirely disappear in the foreseeable future is most unlikely; that they will have to be adjusted to changing conditions is, however, certain.

In order to plan changes in hospital organization, it will be necessary to anticipate changes in hospital populations. One of the questions which may profoundly influence future hospital planning deals with the fate of the chronically hospitalized, "custodial" patients. Is it likely that their number increases or decreases as communities provide more and better facilities for the prevention of mental illness and for the care and rehabilitation of the mentally ill?

ANY ANSWER TO this question can, at the present time, be no more than an educated guess. We shall use some very limited data derived from present-day conditions in an attempt to predict possible future trends. Whether or not these trends will materialize will depend, however, on numerous and complex variables which we cannot possibly discuss in this context.

MATERIAL, METHOD

Most methods to study the background of chronically ill, hospitalized patients necessitate the use of extensive statistical investigation. Often the invariably needed demographic data are not available. We, therefore, chose a simple method, being fully aware of the fact that our data, although easily available and fortunately not in need of demographic correction, may possibly lack the full reliability and accuracy one would desire. We compared the number of patients from one given county residing in state hospitals to the number of patients from this county yearly admitted to state hospitals.

$$\text{R/A (Residence/Admissions) Ratio} = \frac{\text{Patients residing in hospital}}{\text{Patients yearly admitted to hospital}}$$

A high R/A ratio would indicate that many patients were permanent residents of state institu-

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TABLE 1:

COUNTY	R/A RATIO	URBAN/ RURAL	COMMUNITY OR PRIVATE CLINIC, OR HOSPITAL	STATE HOSPITAL
Gogebic	6.1	Rural	None	None
Iron Mtn.	5.6	Rural	None	None
Kent	5.2	Urban	Yes	None
Ingham	4.9	Urban	Yes	None
Newaygo	4.8	Rural	None	None
Presque Isle	4.1	Rural	None	None
Berrien	3.9	Mixed	None	None
Muskegon	3.7	Mixed	Yes	None
Saginaw	3.7	Urban	Yes	None
St. Clair	3.6	Mixed	Yes	None
Kalamazoo	3.5	Mixed	Yes	In County
Genesee	3.4	Urban	Yes	Next County
Hillsdale	3.4	Rural	None	None
Chippewa	3.3	Rural	None	Next County
Marquette	3.1	Rural	Yes	None
Washtenaw	3.0	Urban	Yes	In County
Calhoun	2.9	Mixed	Yes	Next County
Jackson	2.3	Mixed	Yes	Next County
Lenawee	2.2	Rural	None	Next County
Grand Traverse	2.1	Mixed	None	In County
Macomb	2.0	Suburban	None	Next County
Oakland	2.0	Suburban	None	In County
Luce	2.0	Rural	None	In County
Monroe	1.9	Rural	None	Next County

Table 1: R/A Ratios and Mental Health Facilities in 24 urban or rural Michigan counties.

tions, although only few were admitted every year. It could, therefore, be regarded as indicating a trend of sending a relatively larger share of long-term cases to the hospital. Conversely, a low ratio was interpreted as the result of faster turn-over and short-term hospitalization.

We calculated R/A ratios for 25 randomly selected Michigan counties. Since considerable and significant differences were found, we investigated three possible causes. First, we divided the counties into predominantly rural, urban, and mixed areas. Second, we established the presence of public or private mental health facilities (clinics and hospitals for adult patients) in the communities. Third, we investigated the accessibility of regular state hospitals for these counties. Here we distinguished between counties in which state hospitals were located, counties directly adjacent to such areas, and counties without close access to state hospitals.

RESULTS

Table 1 indicates that the Rural/Urban parameter as such does not correlate directly with the R/A ratio. We find both rural and urban counties on either end of the scale.

The availability of community and private mental health services has a bearing on R/A ratios if an additional factor, namely, the accessibility of state hospitals, is taken into account. We find, on one end of the scale, counties with good community facilities, like Kent and Ingham, but without close access to state institutions. These have a very high R/A ratio, comparable only to extremely isolated rural counties without mental health facilities at all. Counties which do have both community mental health facilities and easy access to state hospitals have significantly lower R/A ratios (Washtenaw and Jackson). Their R/A ratios, however, are still higher than those of counties which have no mental health clinics or private hospitals, but who have easy access to state hospitals (Grant, Traverse, Macomb, Oakland, Luce and Monroe).

The fact that counties with good community mental health facilities seemingly contribute a larger share of long-term hospitalized cases appears, at first glance, surprising. If we consider, however, that we are dealing with relative, not absolute, numbers, we can easily understand the cause of this finding.

Counties with community clinics do not necessarily send more chronic cases, but they most likely send less short-term cases. That adequate county and city-run facilities will indeed eliminate the necessity to send patients with good prognoses to state hospitals, can be best demonstrated if we look at the R/A ratio of patients from Wayne County only:

Wayne County (Metropolitan Detroit), at first glance, does not seem to fit the pattern. In spite of excellent community mental health facilities (state, county and private), it has the remarkably low R/A ratio of 2.2. This ratio is calculated, however, under the inclusion of the turnover rates for Wayne County General Hospital, which is both a State and County Institution.

IF WE LOOK AT the R/A ratios for Wayne County patients admitted to state hospitals proper (Table 3), we find indeed that these are long-term rather than short-term cases. This becomes most apparent in Northville, which admits Wayne County patients only. Pontiac, located in the immediate neighborhood of Northville, admits no Wayne County patients at all and shows the expected rapid turnover. Ypsilanti holds somewhat the middle, if the R/A ratio for all patients in this hospital is considered. It compensates for the long-term Wayne County patients by taking in more short-term cases from the surrounding rural communities.

Hardly anticipated is the close correlation between R/A ratio and accessibility of state hospitals (Table 4). Counties in which state hospitals are located and those in close geographical vicinity of state hospitals range consistently lower on the list. No county with an R/A ratio of over 3.5 has direct access to a state hospital.

We were able to reproduce this pattern by investigating the R/A ratios of the six counties served by Ypsilanti State Hospital.

Again, we find a high R/A ratio — and a relatively high proportion of chronic cases — in patients coming either from counties with very good community facilities or from geographically more remote areas (Hillsdale).

FAST TURNOVER — implying good prognosis — appears most frequently in patients from communities without mental health facilities of their own, but with easy access to the state hospital. The greater propensity of these counties to send short-term cases to the state hospital can hardly be explained in terms of legal accessibility.

Ypsilanti State Hospital receives more short-term cases from neighboring Monroe than from the geographically more distant Hillsdale, although it officially gives equal service to both counties. The ability to establish direct community relations may be of decisive influence on the type of patient that comes for treatment.

DISCUSSION AND CONCLUSION

We are aware that one single parameter — the R/A ratio — is an insufficient basis for the pre-

TABLE 2:

	ACCESS TO MENTAL HEALTH FACILITIES		MEAN
#COUNTIES	COMMUNITY	STATE HOSPITAL	R/A RATIO
6	None	None	4.6
6	Yes	None	4.0
5	Yes	Yes	3.0
7	None	Yes	2.1

Table 2: Mean R/A Ratio and access to Mental Health Facilities. Wayne County excluded.

TABLE 3:

PATIENTS	HOSPITAL	R/A RATIO
All Wayne County Patients	All Hospitals	2.2
Wayne County Patients	Wayne County General Excluded	5.4
Wayne County Patients	Wayne County General	0.9
Wayne County Patients	Northville State Hospital	4.8
Wayne County Patients	Ypsilanti State Hospital	4.3
Patients from six Counties	Ypsilanti State Hospital	3.8
No Wayne County Patients	Pontiac State Hospital	2.7

Table 3: R/A ratios for patients from Wayne County and for hospitals located in or near Wayne County.

TABLE 4:

COUNTY	R/A RATIO	ENVIRONMENT	PSYCHIATRIC FACILITIES
Wayne	4.3	Metropolitan	Clinics, County and City Hospitals
Hillsdale	3.3	Rural	No Facilities
Washtenaw	2.7	Urban	Clinics, State Hospital in County
Jackson	2.3	Mixed	Clinics, State Hospital in County
Lenawee	2.2	Rural	State Hospital in Next County
Monroe	1.9	Rural	State Hospital in Next County

Table 4: R/A ratio for patients at Ypsilanti State Hospital.

diction of future trends. Its use is appropriate mainly because our statistical results confirm what common sense would have anticipated. Our findings ignore highly important factors like aftercare programs, impact of present and future therapies, changes in the general population, etc. The small predictive value they have indicates, however, that the state hospital of the future may have to meet two challenges.

For one, it appears that the state hospital has served its neighborhood communities better than it is frequently given credit. It must have induced enough trust and confidence in the surrounding counties that relatively uncomplicated, short-term cases were sent for treatment — even from communities that have mental health facilities of their own.

It is tempting to emphasize this role further and to turn state hospitals into true community facilities with close ties to specific counties. Such plans are greatly encouraged and vigorously pursued at the present time. This development may require a great amount of patience and energy, since the odds are stacked against the state hospital.

IN VIEW OF THE current emphasis on community psychiatry, it may become increasingly difficult to compete with county and community-run facilities. The improbability of radical changes in financial allocations, the relative isolation and inadequate transportation, the impossibility to apply for matching funds, the difficulty of obtaining federal grants, and the general unattractiveness of many state hospitals may prove to be serious — although not hopeless — handicaps.

Less well recognized is a foreseeable increase of severely and chronically ill patients in state hospital populations. Our own data indicate that the establishment of adequate community resources may substantially infringe on the state hospital's role in the treatment of the more hopeful, easily rehabilitated patients. Especially if the rural counties in the immediate vicinity of state hospitals establish their own clinics and county care facilities, a large percentage of the short-term cases may, in the future, never leave the community. This, in turn, must burden the state hospital with the "incurables," with the patients that can neither be taken care of in the community, nor return to the community.

AS THE ABSOLUTE remission rate drops, state facilities for the mentally retarded and epileptic may want to channel their overflow into the vacated state hospital beds. The severely regressed schizophrenic, the deteriorated, the organically impaired, the feebleminded who is beyond the means of community rehabilitation, and the geriatric patient may become more and more the predominant responsibility of the state hospital.

The state hospital, as yet preoccupied with the treatment of the more acutely ill patient, has had, so far, little time to develop more adequate resources for the rehabilitation of the chronically mentally ill. Vigorous planning and the mobilization of funds seems imperative to parallel efforts pertaining to community psychiatry. Long range rehabilitation programs, special education, physical

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and vocational training may become increasingly important as the share of the long term cases increases in the state hospital population. It should be relatively easy to fit such programs into existing structures; easier, perhaps, than to change the role of the state hospital altogether.

We do not suggest that the state hospital should abandon its current interest in direct community services. As these expand, however, the state hospital should reorganize its resources in order to play a complementary, rather than a competitive role in over-all mental health planning.

SUMMARY

Current trends of admission to and hospitalization in state mental hospitals are investigated. Our findings indicate that communities with adequate mental health facilities (clinics, private hospitals) send a relatively large share of chronic, long-term cases to state hospitals, whereas, geographical vicinity apparently encourages hospitalization of short-term and acutely ill cases. As community mental health programs become more effective, it can be expected that a higher proportion of severely ill, "incurable" patients will reside in state hospitals.

It is suggested to continue the strengthening of the ties between the state hospital and the community and also to start vigorous planning of long-term, custodial, and rehabilitation programs.

REFERENCE

Michigan Mental Health Statistics, Annual Report, July 1962-June 1963, Michigan Department of Mental Health, Statistical Section, Lansing, Michigan (1964).

Population Trends And Medical Manpower Needs

BY MALCOLM H. MERRILL, M.D.,
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It is a personal and professional privilege to take part with you in this annual meeting of the medical profession of Michigan. As a physician and health worker in U.S. foreign assistance, I appreciate this opportunity to confer with you about world population trends and medical manpower needs.

We hear much these days about the world "population explosion." Because of its enormous importance, we can be sure discussions of it will continue far into the future. Hopefully, these discussions will be accompanied increasingly by corrective action. In any case, all of humanity is involved in the population problem and will have to live with its expanding effects upon the world around us.

The medical and allied professions will share fully in this involvement, not only in meeting the medical care needs of additional multitudes, but also in supplying professional manpower for expansion in public health services and family planning programs. It is only in recent years that special attention on a broad organized basis has begun to be directed to the population problem.

THE POPULATION INCREASE

World population is increasing now at the fastest rate ever known — about two percent per year, overall. At this pace, the 1966 total of about 3½ billion people would double within the next 35 years.

That would indeed be an "explosion." In this phenomenon, no part of the earth is exempt. Numbers are increasing rapidly in the United States and other so-called "developed" countries, as well as in the less-developed areas. However, it is notably true that the most rapid rates of increase are in the poorer, less-advanced countries.

The sudden ballooning of world population that is now under way threatens us with severe, even cataclysmic, problems. It is coming at a time when our planet is already crowded relative to its resources. Though the earth's potential for further resource development is undoubtedly very great, the present usable resources are relatively scarce, and at least half the human race is having to live at levels of bare subsistence.

Increasing pressure of population upon resources is an important element in this picture. World population has already doubled itself twice in the past three centuries — once in the less than 100 years since 1870, and once in the two centuries preceding 1870. Before this span of roughly 300 years of increase, it had taken 1700 years for a doubling of population to occur — from the time of Christ to the mid-17th Century.

"STANDING ROOM ONLY"

Statistically, the present rate of world increase would within a few more centuries bring mankind literally to the stage of "standing room only." (Figure 1) Here we see how the population

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This paper was presented by Doctor Merrill, Director, Health Service, Office of Technical Cooperation and Research, Agency for International Development, at the 1966 annual meeting of the Michigan State Medical Society, Grand Rapids.

totals would mount at varying rates of growth. For example, continuance of the present rate would give us a world population of 23 billions within the next 100 years. Within 200 years, this would become something upwards of 175 billions.

Such figures as this are striking, and are useful for illustration. Of course, it is well to recognize that no such total as 175 billions is actually possible within the next two centuries, owing to lack of food and the other resources that would be required for their maintenance. Long before that point could be reached, the engines of famine and pestilence — and war — would start their deadly work.

WHAT WILL THE PROBLEM BE BY YEAR 2000?

Actually, we can hardly imagine what the world will be like if the population reaches the projected 7-billion mark within the next 3½ decades. We cannot now see, certainly, how this earth would become able within just a few years to feed, clothe, house, and provide basic public services for what would be, in effect, an additional world of people. We know that many countries are just now beginning to improve the present lot of their depressed millions. How cast can improvement proceed in the future?

RELATION BETWEEN POPULATION AND DEVELOPMENT

The population increase poses numerous problems in world resource development. Barring some great disaster, it is clear that population will surely expand to new heights within the coming decades, even if very considerable effort is thrown into the balance on the control side. Development of additional resources, particularly of food production will be an imperative of historic proportions.

Yet the too-rapid rise in population is proving a major barrier to expansion in resource development in many countries — absorbing too much of national production, eating up too much of the capital-savings which otherwise would accumulate from initial development activities. Thus, it is increasingly evident that efforts to curb population increase must have an important place in the population-resource equation.

This raises key questions in the population area — questions which will require both answers and action. What shall be done to cope with the population tide? What control efforts shall be conducted, and on what scale? When? With what resources of men, materials, and money?

These are difficult questions indeed, involving the decisions and actions of many nations and their people.

AN AWAKENING TO THE PROBLEM

Fortunately — thanks to the vision and leadership of a relative few, including demographers and others in the population and health fields — the world is awakening to the necessity for slowing its population increase; specifically, for the control of runaway birth rates. Throughout the world, there is also a growing emphasis upon improvement of the *quality* of humankind through better health, better education, better nutrition, and better environment.

The evidences of this awakening are expanding.

THE U.S. GOVERNMENT has recently begun enlarged assistance for family planning work, both at home and abroad. Its concern, stressing the factors of quality of life, includes maternal and child welfare and family and social well-being, as well as limitation of family size.

THE UNITED NATIONS has endorsed reduction of the rate of population increases through family planning and is now at work in this field.

Figure 1

If the population increases each year at	The total population will double in	And a world population of 3,000,000,000 will increase in one century to
1 percent	69.3 years	8,200,000,000
1½ percent	46.2 years	13,400,000,000
2 percent	34.6 years	23,000,000,000
2½ percent	27.6 years	36,600,000,000
3 percent	23.1 years	60,300,000,000
4 percent	17.3 years	163,800,000,000

THE SOVIET UNION, other Iron Curtain countries, and mainland China have launched active programs to reduce birth rates.

AN INCREASING NUMBER OF THE LESS-DEVELOPED COUNTRIES of the free world are turning attention to their rapid population growth, particularly as it affects their economic development, and are seeking out avenues for birth-rate control. India and Pakistan, with over one-sixth of the total world population, are conducting major field programs through thousands of family planning centers and clinics. Turkey, Taiwan, and Korea also have vigorous programs under way, involving varying levels of limited U.S. assistance.

MANY OTHER AGENCIES are at work in the foreign assistance field. The British and Swedish Governments are active and the Japanese Government is planning to take part. Their help is additive to that of the United Nations and the Pan American Health Organization. Also, such institutions as the Ford Foundation, Rockefeller Foundation, other philanthropic organizations, the Population Council, and planned parenthood bodies in many countries are continuing their pioneering help.

U. S. POLICY STATED

The U.S. Government's policy recognition of the population problem has been stated by President Lyndon B. Johnson. In his State of the Union Message of January 4, 1965, he announced, "I will seek new ways to use our knowledge to help deal with the explosion in world population and the growing scarcity of world resources."

In a later message he added, "The growing gap — between food to eat and mouths to feed — poses one of mankind's greatest challenges. It threatens the dignity of the individual and the sanctity of the family. We must meet these problems in ways that will strengthen free societies — and protect the individual right to freedom of choice."

THE LAUNCHING OF ACTION

Thus, the world awakening to the population threat is not only an expanding reality, but the initially-required policies and decisions are being made, and broad action is starting. In these respects, the situation is definitely heartening, though no one can as yet answer the question about resources for the required activities, especially resources of trained manpower, which will soon arise on a multi-country scale.

In U.S. assistance, the Agency for International Development is now providing or planning to provide help, in varying degrees, for the population programs of numerous less developed countries. This help is given only in response to their requests. Many of the newer countries wish to curb their excessive population rise in order to speed up improvements in general living conditions. These improvements, many believe, are essential for their stability and growth.

Thus far, some 25 countries have been given limited initial help by A.I.D. These include India, Pakistan, Taiwan, Korea, Turkey, the United Arab Republic, Jamaica, the Dominican Republic, Ceylon, and several countries in Latin America. This initial assistance is mostly for help in statistical studies, staff training, and preliminary advisory aid. Thus far, only small assistance has been given in provision of program equipment, such as vehicles and educational aids. However, Turkey has just received a development loan of $3.6 million for purchase of 1400 jeep-type vehicles in the United States.

Also, A.I.D. has given help for establishment of several centers for population program studies and training, mainly at selected universities in the United States, to meet the needs of countries not having facilities for these purposes.

This quick sketch of A.I.D. activities in population assistance is given to show the scope of the beginning that is now in progress. With time, the present work will strike deeper roots and spread more widely.

COOPERATION WITH OTHER AGENCIES

There are some 150 countries in the world, at least two-thirds of them in the less-developed category. Some 75 of those in this group have no present activities in the family planning field, even in the sphere of preliminary studies. Expansion of interest and action by virtually all of them will be necessary, over time, for effective world-wide control work.

I would stress at this point that A.I.D. does not expect to assist all of these countries in their family planning programs, even if they feel help is essential. We shall hope that many who wish and need outside aid will receive it through the United Nations, other countries, and private foundations and organizations. The task is world-wide and will require the participation of all available agencies. Our cooperation with them is active at present and will continue to be so.

FOCUSES OF CONCERN

The population activities already under way tend to focus in Asia, Latin America, and Africa, which together have over two-thirds of the world's population. Overall, these regions would double their total population within 20 to 30 years, if present rates continue.

Significantly, these are precisely the regions where health and medical facilities and personnel are relatively scarcest; where economic resources, education, and living levels are lowest on a per capita basis; and where cultural and other barriers to action are most important. The task ahead, therefore, is far from easy.

Some have argued that, given time, birth and death rates will come into balance. It is true that Europe, up to about 200 years ago, had very high birth rates, very high death rates, and slow growth of population; that the coming of modern medical science and technology reduced death rates and that, after a time, birth rates fell almost correspondingly. However, Figure 2 shows the dramatic decrease in mortality that is associated with the use of modern medical procedures in some of the lesser developed countries. This rapid decrease differs widely from the European experience, where the mortality decline was relatively gradual over a long period of time. Also, it must be noted that the decline in birth rates, which eventually restored relative stability for population growth, occurred over a span of 150 years. The differences from the European situation of 1750-1950 are most important. No major region today is in any position to accommodate an extended adjustment period like that of Europe.

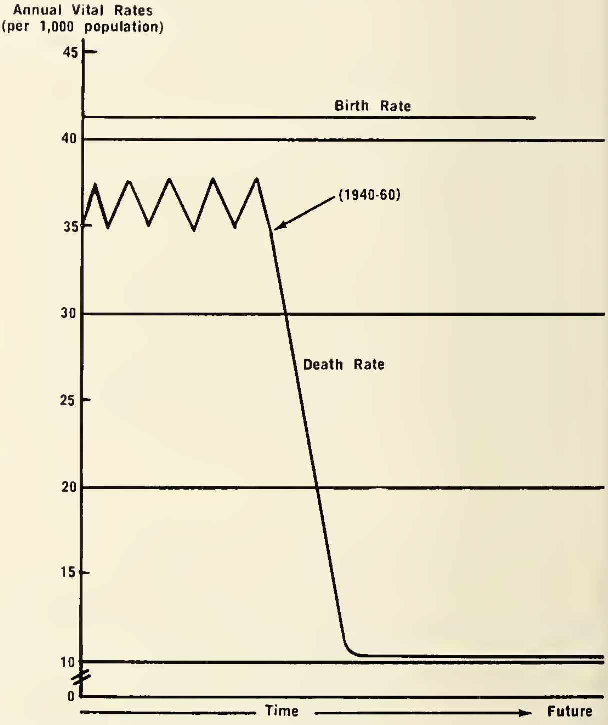
MANPOWER FOR THE TASKS AHEAD

The discussion to this point is intended to emphasize the relationships between rate of population increase, the health status of the people, and the potentials for health manpower needs. We are confronted not only with the filling of the health manpower gap to provide wider services for the present population, but also the addition of health personnel for the needs of over 60 million added people each year. To fulfill this need we must think of the services to be provided by physicians, sanitarians, public health workers, hospital administrators, nurses, laboratory technologists, other professional health personnel and auxiliary help of numerous kinds. Medical and other health manpower will be required to an extent never before witnessed.

A large proportion of the coming demand for health services will necessarily arise in the less-advanced areas of the world. In these, despite recent reductions in mortality from major scourges, general health is very poor and many diseases are still rampant. As a result, the need for health services is greater than in the more advanced countries. This further compounds the problem of filling the health manpower gap.

Now what are the implications of all these changes in relation to medical manpower needs? To add physicians at the ratio of 1 to 670 — the approximate U.S. ratio — for the new population each year would require the addition of 100,000 physicians per year, world-wide, in addition to replacement of physicians leaving the field through death. These figures are simply illustrative of the size of the task. However, the increased population will also require the provision of correspondingly added personnel in all the associated health manpower disciplines. Even so, the indicated additions on this basis do not take into consideration in-

Figure 2



Schematic presentation of birth and death rates in less-developed countries, mid-20th century. (The steep drop in the death rate from approximately 35 per thousand began at times varying roughly between 1940 and 1960 from country to country.)

creases which are required if we are to overcome the present world deficit of health manpower for the existing population.

AAMC REPORT

The Association of American Medical Colleges, in its 1965 report, "A World Program for Health Manpower," emphasized that there is currently alarming deficit of health manpower in the developing countries. This deficit as applied to physicians shows something of the wide disparity between various parts of the world in terms of the physician-population ratios. The United States has a ratio of 1 to 500 projected for 1975. The estimated ratio in Africa at present is 1 to 20,000 and that of Asia is almost the same. It will also be necessary to train very large numbers of health-related professionals. The recruitment, education and training task here is large and formidable.

Added numbers of physicians will be needed in all countries. Studies are needed on the actual numbers required and how their abilities may be best deployed. In many countries the physician-population ratio of the United States is not achievable for several decades. In the meantime, efforts need to be directed to enriching the physicians' potential by concentrating on the preparation of increasing numbers of associated health personnel. It is possible that much of the future shortage of physicians may be remedied by better ways of using their skills as team leaders, with greater utilization of auxiliary health personnel so as to serve much larger numbers of people.

In all countries and particularly in the lesser developed, the medical profession tends to concentrate in centers of population. While we are concerned about this phenomenon in the United States, it becomes critically important in many countries where the vast majority of the population live in rural areas.

In a move to help in the guidance of our government's policies in the international health manpower field, the Agency for International Development recently appointed an Advisory Committee on International Health Manpower. This committee is comprised of a dozen leaders in American medical education. It is already seriously considering, together with our staff, the most productive utilization of the limited resources provided to the Agency for assisting developing countries. Our hope is that we can mobilize and help these countries in their effort to solve the health manpower problems.

The vast reservoir of concern and ability of the professional health manpower of our country can and will assist the less privileged nations to achieve their goals of improved health services.

MORE MEDICAL SCHOOLS AND RESOURCES

The AAMC's study found that the developing countries are generally aware of their need for additional physicians and supporting staff. The report shows that these countries are moving, within their limited resources to meet some of their more pressing needs.

Since 1954, more than 80 additional medical schools have been established in the developing countries of Asia, Africa, and Latin America. In that year these countries had 194 medical schools — 11 of them in Africa (excluding the Union of South Africa), 103 in Asia (excluding Japan, Communist China, and Hong Kong), and 80 in Latin America. By 1960 these regions had increased their total to 239 — with Africa having 12, Asia 127, and Latin America 100. India alone had added 17 medical schools. And since 1960 India has launched 20 and Latin America 10 more medical schools. Additional medical schools will be required in many parts of the world, including the United States.

The above discussion pertains to the physician deficit. Yet this is only the visible part of the iceberg. As one moves around the world, the lack of the other supporting professional personnel looms as perhaps an even more acute problem. Even with the scarcity of physicians, some developing countries have more physicians than nurses. Laboratory technologists, X-ray technicians, nutritionists, physiotherapists, and other professionals who play such a prominent part in our medical team are just beginning to emerge in many countries.

ASSISTANCE OF MEDICAL PROFESSION

In the world health tasks we see ahead I am sure that the medical profession of America and of Michigan will assume increasing leadership and assistance responsibility.

Quoting again from the AAMC report, it has said, "It is the considered opinion of leaders in American medical education who have carefully examined this problem that the United States can ill-afford a do-nothing attitude. Given the required support, which is in fact being requested from American medical education, medical education in the developing countries will, by increasing the effectiveness of the health system, increase the ability of the countries to deal with their own problems, including that of population control, and to become self-supporting and effective members of the society of nations."

CONCLUSION

The population and health problems of the future will be impressively large — much greater than now. The welfare of the world, our country, and ourselves is bound up in the solutions we develop for these problems within a not too-prolonged period. The leadership and participation of the medical profession will be vital in developing these solutions.

We can be sure that the road to their solution will be uphill, long, and difficult. However, I am confident of our ability and determination to render the services that are needed, including those in the training field.

As a nation we have taken up the challenge. We shall overcome the difficulties, I am sure, if we give this task the priority of attention it now calls for.

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On the Profession of Medicine

BY GLENN W. GEELHOED
THIRD-YEAR MEDICAL STUDENT
UNIVERSITY OF MICHIGAN

What does it mean to follow a profession?

Medicine is widely called a profession, yet the term "profession" connotes several different meanings. It would be interesting to note what meanings the term has and in what senses they are applied to medicine. I should like to analyze and describe four uses of the term "profession" and examine implications the applicable meanings have for the ethics of the medical profession.

First of all, the term "profession" can mean the following of an occupation as a means of livelihood or for gain. In this sense a profession is simply a means for making a living.

Uses of the term in this sense are common, as in a professional pugilist, or a professional driver who makes a living by driving a truck. That there is nothing innately noble about the term "profession" when so used is seen in its use to describe criminals, such as a professional safe-cracker. Another example can be noted in its application to certain women who are said to practice the "world's oldest profession."

THE WORD "PROFESSIONAL" can also imply a certain expert mastery or competence in almost any field. There it is used as the opposite of "amateur." The popular advertising motto "the best is always pro" is an illustration of the term in this sense. A combination of special abilities is implicit in this sense of the word and standards of behavior and achievement are concomitant features.

Several professions by the first criterion of the term "means for making a living" have acquired a subspecialized meaning in the second sense of the term by superimposing the adjective "learned." The "learned" professions have an inherent set of requirements that place them beyond the practice of anyone who might wish to make a living by them.

There is also a recognized method for achieving the skills or knowledge that set professions apart from other occupations. No qualitative difference has separated the second sense from the first, but merely a quantitative level of know-how.

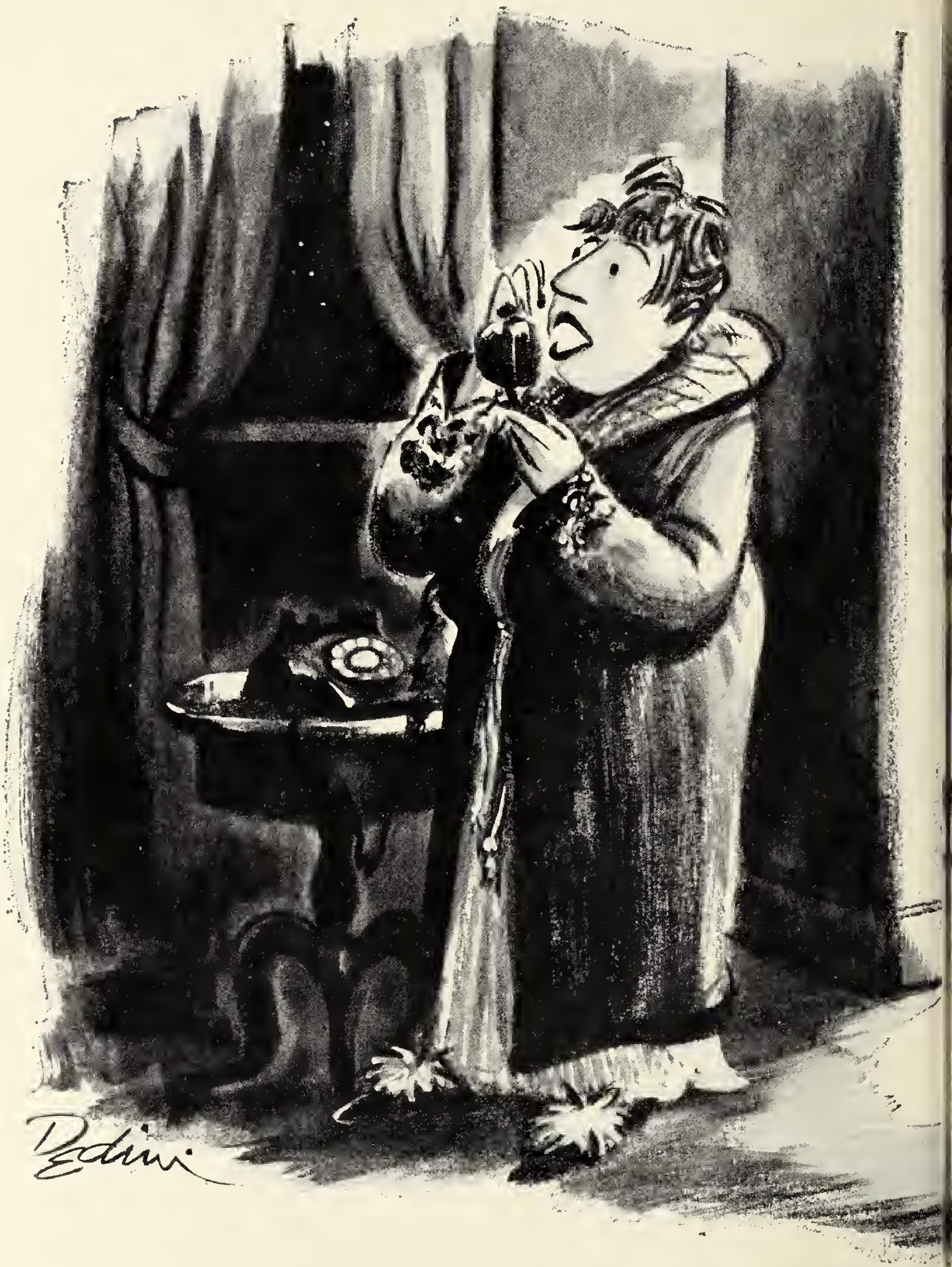
A third sense in which the term "profession" is used involves following as a business an occupation ordinarily engaged in as a pasttime, or making a business of an office not properly to be regarded as a business.

Examples of the former would be golf, ski, chess, or tennis pros; an example of the latter would be a "professional politician." In the former case there is a note of dilettantism, a "playing at" an occupation as though it were a hobby in which one had acquired sufficient proficiency to warrant payment. The latter case evinces a betrayal of a trust, a taking advantage of a responsibility to one's own profit.

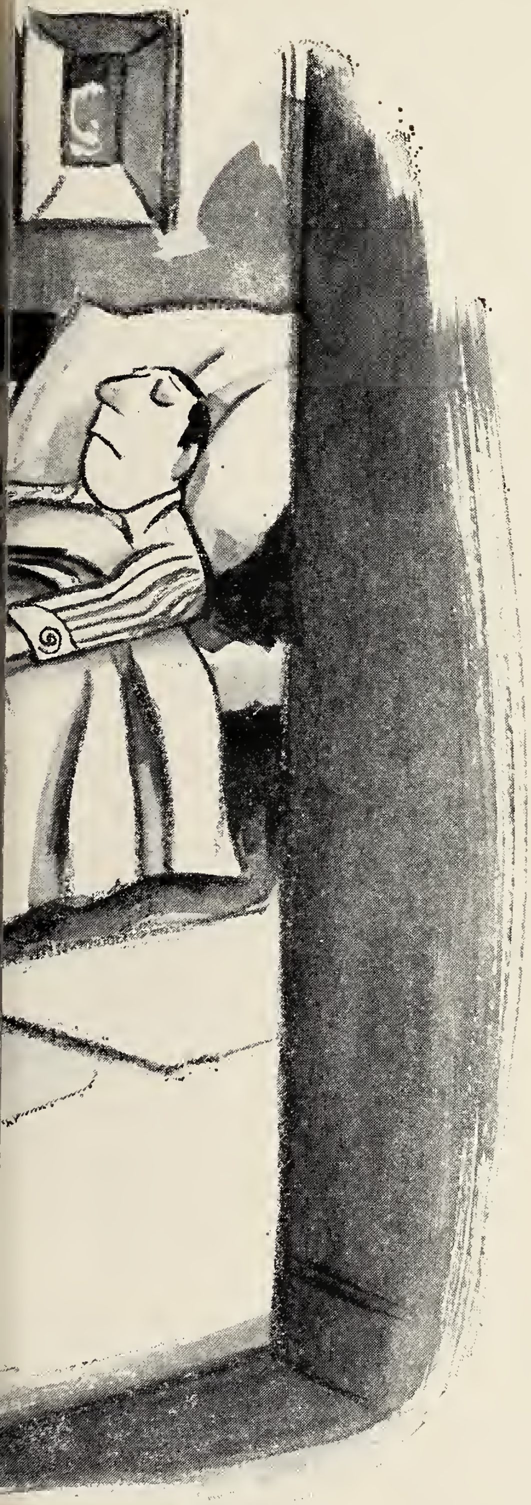
And last, there is the sense of the term "profession" that means a calling, an avowal or declaration that one "stands for something." The "professor" is a defender of principles to which he adheres. The term "profession" is used in religion

CONTINUED ON PAGE 322

Mr. Geelhoed was the first-place winner in the Norman A. Welch, M.D., Medical Ethics Essay Contest sponsored by the Judicial Council of the American Medical Association.



"George wants to know if it's okay to take his cold medicine now, Doctor, instead of seven o'clock?"



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to refer to that outward declaration of a faith in doctrine and ideals, using the term in this same sense.

OF THESE FOUR meanings, which applies to the profession of medicine?

Since almost all physicians depend upon the practice of their art for their livelihood, medicine is a profession in the first sense. As in the other crafts and trades included in the first sense, the physician makes a living by offering his commodity of medical service as an item of exchange. Unlike the majority of the crafts which are its fellows under the first criterion, medicine is a profession that commands more than a living; it has a high return value that is often the first thing that strikes the eye of the young aspirant.

The respect and reward that are given to the doctor as artisan (cf. *der Arzt*) may be due to the demand and value of his commodity as estimated by the consumer, or it may follow additionally from the higher requirement levels seen under the second sense of the term "profession."

By the second criterion, medicine is indeed a learned profession and one that requires a specialized expertness of no mean achievement. This refinement of the profession is but a quantitative step above the first level; however, the division is not a qualitative one but merely a measure of cleverness. A technician can function at whatever level he seeks, since there is no morality that necessarily advances with the sophistication of technology. There are technicians (who are professional in both first and second senses) in medicine who wash glassware, technicians who draw blood, and some who remove appendices, all within the same spectrum of measured skill.

The third sense of the term "profession" enters into the consideration of those who consider a profession "the gentlemanly thing to do." A profession in this third sense is what one follows to avoid doing manual labor, and offers the dilettante a respectable perch from which to view the world and select items for smattering.

A popular version of this among young physicians is medical gamesmanship. More despicable than those who play at medicine are those who play it for their own advantage and enjoy the peculiar type of power with which physicians are entrusted.

IT IS ONLY WHEN we reach the fourth and last sense of the term "profession" that we face what it is that medicine stands for. A hard look at the practice of medicine while standing upon this highest rung of the ladder in the definition of their profession may convince many physicians that they do not have a profession in this final sense, for in medicine what is there to profess?

If medicine be a calling, to what are we called?

For the ethical standards and goals medicine professes, some knowledge of the historical heritage that has contributed to the profession in this peculiar sense is necessary.

One of the earliest and still most articulate examination of the qualities that constitute the true profession of medicine is found in a Socratic dialogue in Plato's *The Republic*. Thrasymachus is inquiring into reasons why it is that men work. He has just decided that all men, including the ruler in even the ideal state, would be motivated only by self-interest in the power that would accrue to the person in the profession and in the living he would make.

Socrates stops him short:

> "Enough of this banter . . . . Tell me this: Is the physician of whom you spoke as being strictly a physician, a maker of money, or a healer of the sick? Take care you speak of the *genuine* physician."
>
> "A healer of the sick," replied Thrasymachus.

But, Socrates now asks, aren't you neglecting the fact that each of the individuals who practices medicine has a primary interest in making a living, as in the first sense of the term "profession":

> "Has not each of these persons an interest of his own?"
>
> "Certainly."
>
> "And is it not the proper end of their art to seek and procure what is for the interest of each of them?"
>
> "It is."

Through further questions Socrates develops an alternative thesis that the goal of medicine is in the practice of it; that the refinement and expertness of the art is the goal to be pursued and enjoyed as an end in itself. Taking pleasure in the expertness of medical practice would qualify it as a profession in the second sense of the term. Or *ars gratia artium* might be the self-sustaining energy loop that would justify medicine's definition as a profession to the casual practitioner who is seeking a profession in the third sense.

> "Have the arts severally any other interest to pursue than their own highest perfection?"

> "What does your question mean?"
>
> "Why, if you were to ask me whether it is sufficient for a man's body to be a body, or whether it stands in need of something additional, I should say, certainly it does. To this fact the discovery of the healing art is due, because the body is defective, and it is not enough for it to be a body. Therefore, the art of healing has been put in requisition to procure what the interests of the body require. Should I be right, think you, in so expressing myself, or not?"
>
> "You would be right."
>
> "Well then, is the art of healing itself defective, or does any art whatever require a certain additional virtue; as eyes require sight, and ears hearing, so that these organs need a certain art which shall investigate and provide what is conducive to these ends: is there, I ask, any defectiveness in an art as such, so that every art should require another art to consider its interests, and this other provisional art a third, with a similar function, and so on, without limit? Or will it investigate its own interest?" . . .
>
> "Apparently it is so," he replied.
>
> "Then the art of healing does not consider the interest of the art of healing, but the interest of the body."
>
> "Yes."

Since it appears that our limitation of the profession of medicine to any of the first three senses of the term is no longer tenable, for what good does medicine stand?

> "Well, but you will grant, Thrasymachus, that an art governs and is stronger than that of which it is the art."
>
> Thrasymachus assented with great relutance to this proposition.
>
> "Then no science investigates or enjoins the interest of the stronger, but the interest of the weaker, its subject."
>
> To this also he at last assented, though he attempted to show fight about it.
>
> "Then is it not also true, that no physician, insofar as he is a physician, considers or enjoins what is for the physician's interest, but that all seek the good of their patients? For we have agreed that a physician strictly so called, is a ruler of bodies, and not a maker of money; have we not?"
>
> Thrasymachus agreed that we had.

Socrates concludes with the ethical principle that has dominated the subsequent tradition of medicine. We distinguish man *qua* wage-earner from man *qua* professor of medicine. Only in the fourth sense of the term does medicine rise to a truly noble profession.

AND WHAT IS the good that medicine professes? The good of its objects which are other than they who practice the art and which is external to the art itself. And what are the objects of medicine's service? The patients, the society, in a word — man.

> "And thus, Thrasymachus, all who are in any place of command, insofar as they are rulers, neither consider nor enjoin their own interest, but that of the subjects for whom they exercise their craft: and in all that they do or say, they act with an exclusive view to *them,* and to what is good and proper for *them.*"

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SPECIAL ARTICLE

Smoking--Where Do We Stand?

BY ROSCOE V. STUBER, M.D., F.A.C.S.
HOWELL
MEDICAL CHAIRMAN MICHIGAN DIVISION
AMERICAN CANCER SOCIETY

With cigarette sales booming and stocks climbing and only physicians as a group cutting down on smoking, are we able to take a stand and really tell our patients the health hazards of smoking? Can we continue to allow so many of our patients to kill and maim themselves smoking?

I recently admitted a boy of fifteen to the hospital for acute appendicitis who had been smoking over a pack of cigarettes a day for the last two years. How do we keep youngsters of thirteen and fourteen from starting a habit which from a health standpoint we know we should oppose?

To see some of these youngsters addicted to cigarettes and harnessed to a habit which is so difficult to break is something that we must prevent. I am sure that all of us have experienced the difficulties the heavy smoker has in quitting despite his progressive emphysema or spastic vascular disease. The tragic scene of the man smoking between wheezes and coughs is all too common.

VERY FEW OF US will be able to save many lives by resecting lungs or lobes for cancer of the lung. Even the best thoracic surgeons cannot save much more than 5%-10% of all cases of lung cancer who come to them because of the frequently advanced stage of the disease when first detected. We can do far more by keeping ONE person from being a heavy smoker — for it is estimated that 1 in 8 males, who has been smoking over a pack a day for twenty years, will get lung cancer. The lung cancer death rate of nearly fifty thousand a year in our country is more than we kill on the nation's highways, tragic as this may seem.

With heavy smoking doubling the chances of death from coronary artery disease and increasing the incidence of emphysema nearly twelve times, heavy smoking adds over two hundred thousand caskets to the undertakers business each year.

We also know well the relationship between smoking and peptic ulcer disease and spastic vascular disease. This tremendous morbidity must be stopped.

CIGARETTE ADVERTISING is becoming a part of our way of life. Both my three year old daughter and my nine year old son know far more cigarette commercials than any other type of "jingle," because they hear these so frequently on our television set. Over fifty nighttime television shows have cigarette sponsors including the "Jackie Gleason Show," "Red Skelton Show," "Beverly Hillbillies" and the "Man from UNCLE," all of which have a high teenage audience.

Radio spot jingles seem to be inserted every few minutes to tell you how good their cigarette tastes. I am sure that we will never see the time when cigarette advertising will show the man or the woman with the chronic cough or the emphysematous individual who is chronically short of breath. They will not show the patient with cancer of the lung or point out the increased incidence of peptic ulcer, coronary artery or peripher-

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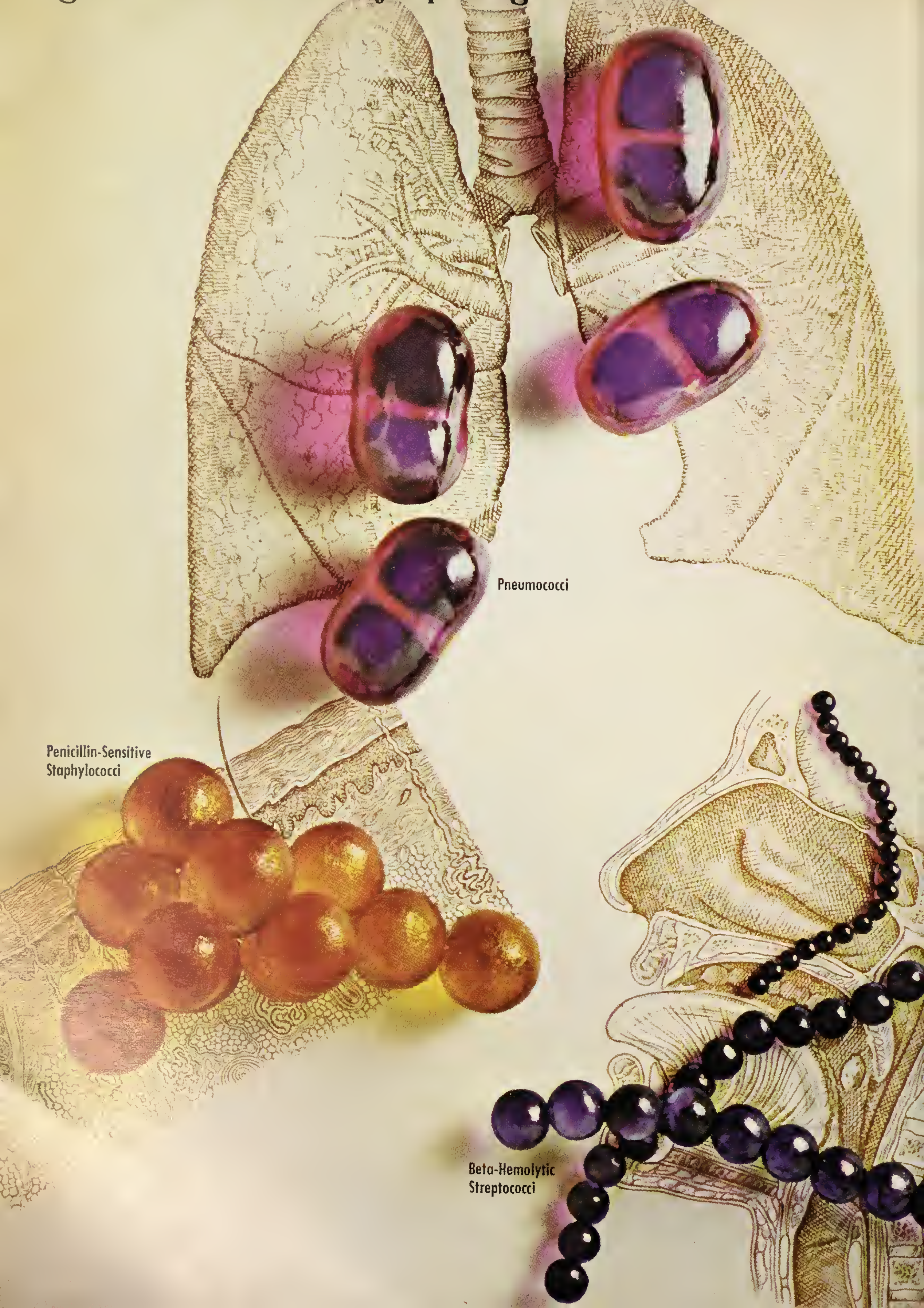
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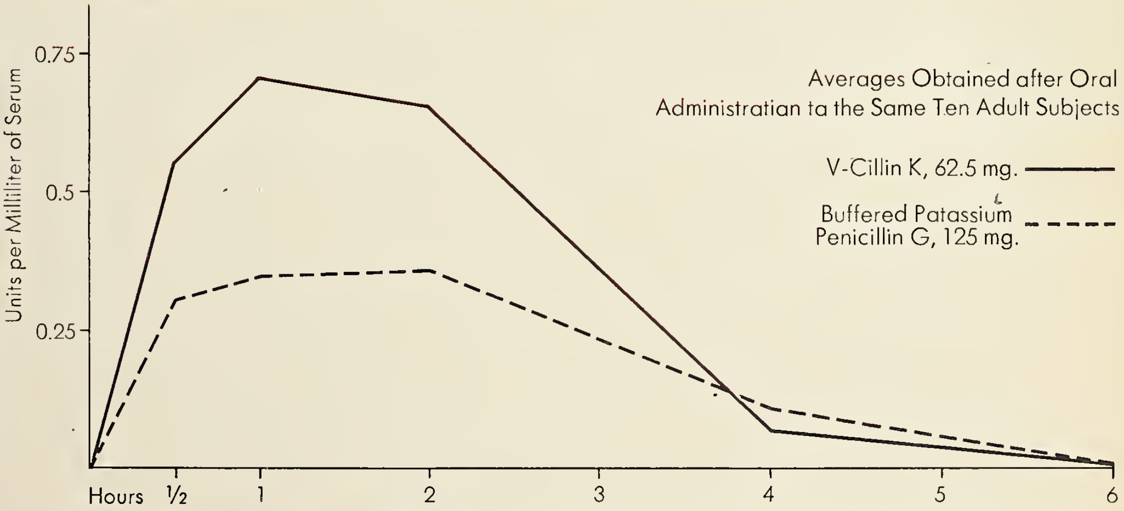
Antibiotic	Staph. Aureus (Penicillin-Sensitive) MIC (mcg./ml.) Median	Staph. Aureus (Penicillin-Sensitive) MIC (mcg./ml.) Range	Streptococcus, Group A MIC (mcg./ml.) Median	Streptococcus, Group A MIC (mcg./ml.) Range	Diplococcus Pneumoniae MIC (mcg./ml.) Median	Diplococcus Pneumoniae MIC (mcg./ml.) Range
Penicillin V	0.02	0.02-0.04	0.02	0.003-0.4	0.01	0.005-0.2
Penicillin G	0.02	0.005-1.6	0.005	0.002-0.2	0.02	0.01-0.1
Methicillin	1.6	0.4-6.3	0.2	0.1-0.4	0.2	0.1-1.6
Oxacillin	0.4	0.1-3.1	0.04	0.02-0.4	0.1	0.04-0.8
Cloxacillin	0.2	0.2-0.8	0.1	0.1-0.8	—	—
Nafcillin	0.4	0.2-0.8	0.04	0.02-0.1	0.02	0.02-0.2
Ampicillin	0.2	0.1-0.8	0.02	0.01-0.04	0.02	0.01-0.04

Adapted from Klein, J. O., and Finland, M.: New England J. Med., 269 1019, 1963.

with high blood levels, even in the presence of food



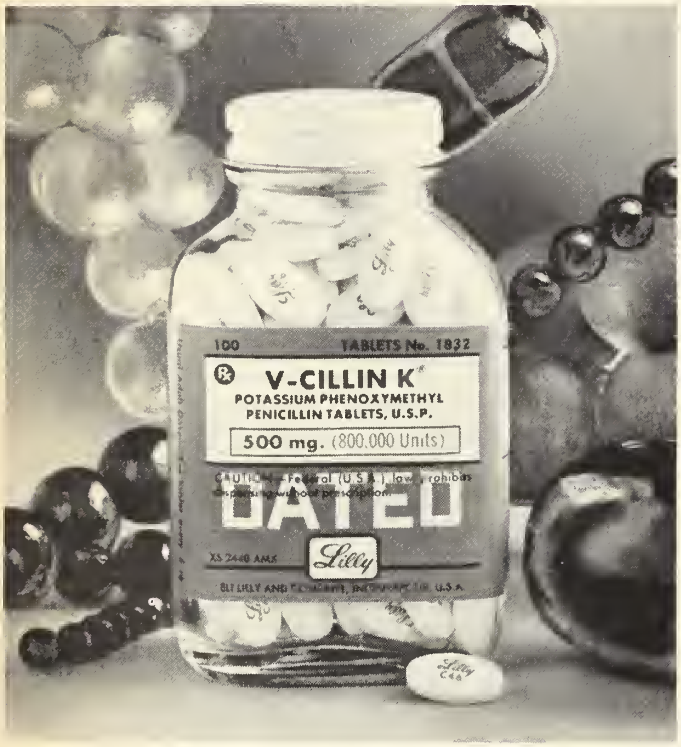
Adapted from Griffith, R. S., and Black, H. R.: Current Ther. Res., 6:253, 1964.

V-Cillin K® Lilly 700157

Potassium Phenoxymethyl Penicillin

(See next page for prescribing informatio

New 500 mg. tablets...a more convenient way to give high doses


100
TABLETS No. 1832
V-CILLIN K
POTASSIUM PHENOXYMETHYL PENICILLIN TABLETS, U.S.P.
500 mg. (800,000 Units)
DATED
XS 2440 AMX
Lilly
ELI LILLY AND COMPANY, INDIANAPOLIS, U.S.A.

Description: V-Cillin K is the potassium salt of V-Cillin® (phenoxymethyl penicillin, Lilly). This chemically improved form combines acid stability with immediate solubility and rapid absorption. Higher serum levels are obtained more rapidly with this penicillin than with equal oral doses of penicillin G. The higher serum levels and acid stability of V-Cillin K make it a more dependable penicillin for oral use.

V-Cillin K, Pediatric, is an oral solution of clinically proved V-Cillin K in teaspoon dosage form. When mixed as directed, each 5 cc. (approximately one teaspoonful) will contain 125 mg. (200,000 units) phenoxymethyl penicillin as the potassium salt.

Indications: V-Cillin K has been shown to be effective in the treatment of streptococcus, pneumococcus, and gonococcus infections as well as infections caused by sensitive strains of staphylococci. It may be used for the prophylaxis of streptococcus infections in patients with a history of rheumatic fever and for the prevention of bacterial endocarditis after tonsillectomy and tooth extraction in those patients with a history of rheumatic fever or congenital heart disease.

Contraindication: V-Cillin K should not be administered to a patient with a history of penicillin hypersensitivity.

Precautions: V-Cillin K should be used cautiously, if at all, in a patient with a strongly positive history of allergy. Reactions occur more frequently in individuals with bronchial asthma or other allergies or in those who have previously demonstrated sensitivity to penicillin. hypersensitivity reactions occur, the drug should be discontinued.

Adverse Reactions: Although serious allergic reactions are mu less common with administration of oral penicillin than with intramusc lar forms, skin rash, symptoms resembling those of serum sickness, other manifestations of penicillin allergy may occur. When penicillin administered, measures for treating anaphylaxis should be readi available. Those include epinephrine, oxygen, and pressor drugs f relief of immediate allergic manifestations as well as antihistamin and corticosteroids for delayed effects.

The use of antimicrobial agents may be associated with the ove growth of antibiotic-resistant organisms; in such a case, antibiotic a ministration should be stopped and appropriate measures taken.

Administration and Dosage: For Tablets V-Cillin K and for V-Cill K, Pediatric, the usual dosage ranges from 125 mg. (200,000 unit three times a day to 500 mg. (800,000 units) every four hours. For i fants, the daily dosage may be 50 mg. per Kg. of body weight divide into three doses.

Beta-hemolytic streptococcus infections without associated bact remia may be treated with 200,000 to 400,000 units three times a da Therapy should be continued for a minimum of ten days to prevent d velopment of rheumatic fever and/or other serious complications. Do age for routine streptococcus prophylaxis in patients with a history rheumatic fever or congenital heart disease may be 200,000 units an or twice daily. When such patients undergo tonsillectomy, tooth extra tion, or other minor surgery, the prophylactic dose should be 500,0 units every six hours given two days prior to surgery and for two da postoperatively. If oral medication is not feasible on the day of su gery, parenteral therapy should be considered. Mild to moderate severe pneumococcus pneumonia has been treated effectively wi 250 mg. every six hours.

In staphylococcus infections, 400,000 units or more should be give every six to eight hours in conjunction with indicated surgical proc dures.

For gonorrhea in males, 500 mg. (800,000 units) every six hours f three doses may be employed; in females, 500 mg. every four hours f six doses are recommended. Patients with a suspected lesion of syphil should have a dark-field examination before receiving penicillin a monthly serologic tests for a minimum of three months.

How Supplied: Tablets V-Cillin K, U.S.P., 125 mg. (200,000 units), bottles of 50 and 100, 250 mg. (400,000 units), and 500 mg. (800,0 units) in bottles of 24 and 100.

V-Cillin K, Pediatric, for Oral Solution, 125 mg. (200,000 units) p 5 cc. of solution, in 40, 80, and 150-cc.-size packages.

Additional information available to physicians upon request. Eli Lilly and Company, Indianapolis, Indiana 46206.

Lilly

7001

al artery disease. They will do their very best to try to tone down the small print on the side of the cigarette package which states, "Cigarette Smoking May Be Hazardous To Your Health." This innocuous statement doesn't seem to dissuade many smokers. The ten billion dollar cigarette industry was able to keep a stronger worded message from their packages.

IT IS UP TO us as American citizens and as physicians to take a stand and work diligently to keep our young people from becoming heavy cigarette smokers. Several things can be done to discourage smoking.

First, we should have no student smoking in and about the public schools. If possible, I should like to see teachers not smoke, or at least smoke only in a privately-designated room.

Second, cigarette sales should be confined to those over eighteen, and like alcohol, fines should be levied against those minors buying cigarettes or merchants who sell to minors.

Third, the American Cancer Society films and film strips on cancer of the lungs should be shown to all school children from the fifth grade through the tenth grade.

Fourth, insurance companies should make heavy smokers high risk clients and take riders against death from coronary artery disease, emphysema and cancer of the lung in patients who are over a pack a day smokers. As yet, no major insurance company has even inquired on their questionnaires as to how much their prospective policy holder smokes.

WE SHOULD TRY TO support legislation to curtail advertising, with perhaps even as in Italy and Great Britain, requiring a ban on all television cigarette advertising. The small note on the side of the cigarette package at present is certainly inadequate.

I noted with interest the recent survey from Roswell Park which showed that the tars which come through the filter cigarettes is still only negligibly reduced and in some cases it is actually higher than the non-filtered cigarettes. A few of the lower tar cigarettes are now using these figures to help promote their product over the higher tar cigarettes. The safe cigarette certainly has not been found.

The tragic, but preventable loss of over two hundred thousand American lives yearly can be reduced appreciably by our efforts to keep our young people from being addicted to cigarettes until the safe cigarette is found. I personally, am sorry for the millions of Americans who are torturing themselves with a chronic cough, wheezing or impaired circulation from smoking.

WE AS PHYSICIANS, can and must take a firm stand and make our profession assume the lead in reducing one of the leading health hazards today.

IN THE STATE OF MICHIGAN, emphysema and lung cancer killed about 3,000 Michigan residents last year compared with 2,300 who perished in automobile accidents. When one adds the death toll of heart disease victims, at least one fourth of whom have emphysema which is the basic cause of heart failure, the habit of cigarette smoking comes into focus again as a leading health problem. Can we take a stand to prevent these diseases related to cigarette consumption by encouraging young persons not to start and smokers to quit? □

Report on Survey

A survey of state medical society journals found that more than 70% — including *Michigan Medicine* — refuse to accept cigarette advertising.

Lawrence J. Berman, M.D., Olympia, Wash., who conducted the survey, had replies from 32 of 36 state journals. Half of those accepting cigarette ads reported that their editorial boards had not reviewed their policy in the past 18 months.

Doctor Berman observed that, "In spite of the wide publicity and general agreement that cigarette smoking is a health hazard and the acknowledged role of the physician as health educator, some medical journals continue to accept cigarette ads."

SPECIAL ARTICLE

New Directions In Nursing Education

BY THERESA PHELPS, R.N.
BRIGHTON

MRS. MURIEL PEARSE, R.N.
DETROIT

INTRODUCTION

One major concern of any profession is the type and quality of education needed by those who will practice on various levels in that profession. Nursing is currently facing up to this concern by planning toward the preparation of nurses in institutions of higher education with the realization that nursing will continue to be practiced on several levels.

The advantages of having nursing education programs in tax-supported degree-granting institutions outweigh the advantages of hospital schools of nursing in most respects. Therefore, it is almost inevitable that the three-year, hospital-based, diploma school of nursing will very gradually disappear. Instead, those who practice nursing on a technical level will be prepared in community colleges and the education of the professional nurse will take place in a university or senior college.

IN MANY RESPECTS, reactions to these new directions for nursing education parallel those which occurred when medicine's famed Flexner Report was published in 1910. Physicians may recall that the latter stressed closing inadequate medical schools and insisted on university-based education as the standard for preparation for medical practice.

Anguished outcries followed, both from within and without the profession, and dire predictions were made that insufficient numbers of doctors would be prepared. Yet, implementation of the Flexner recommendations brought forth "advances in medicine more significant and rapid than in any previous period in human history."[1]

Whether Nursing can effect such "significant and rapid advances" by changing its educational patterns, future historians will record. Of crucial and final import, however, is nursing's current willingness to be more concerned with qualitative proficiency than with quantitative expediency.

WHY UPSET THE STATUS QUO?

It is true that hospital-diploma programs have supplied and continue to produce the largest number of registered nurses. It is also true that there is a trend toward decreased admissions to and graduations from, such programs. This trend is understandable when one reflects on the forces affecting society at large. Three such forces lend credence to the changing directions for nursing education.

If we look initially at the now-trite phrase, "the explosion of knowledge," it seems apparent that this explosion holds overwhelming implications for educators in all professions. A. C. Monteith of Westinghouse Electric recently calculated that a graduate engineer has a "half life of about 10 years; half of what he knows will be obsolete in 10 years and half of what he will need to know in 10 years is not available today!" It is obvious that techniques learned today may be obsolete 5-10 years hence, therefore the professional nurse needs extensive knowledge of scientific facts and principles so that she may with ease transfer her knowledge of old procedures to new ones.

AS MEDICAL CARE becomes more complex and demanding, physicians delegate to nurses many responsibilities they formerly saw as being within the province of medical care; in turn, nurses delegate to auxiliary personnel certain tasks of a nursing nature but which may safely be performed by persons without professional education.

Again it is obvious that the "professional nurse" must have the kind of educational background which will enable her to make independent judgments in a rapidly changing environment. No longer is technical competence alone an adequate base for professional nursing practice. In addition must come an extensive knowledge of scientific facts and principles, gleaned not only from the physical but also from the social and behavioral sciences. Almost ipso facto then, lies the need for nurses prepared at the university level.

Another social force which must be recognized is the great emphasis being placed on the value of a college degree in the world of today. It is a generally accepted fact today that professional education is obtained in a university. Hospital schools of nursing are neither credit nor degree-granting institutions. Is it fair then to expect a student to spend three years in a school taking courses for which no credit can be granted, especially when she can get a similar education in a two-year community college associate degree program?

THIRDLY, ALBEIT indirectly, the unionization of workers in our society has brought about higher salaries for instructors, clerical personnel and others employed in a hospital school of nursing. Inevitably this has caused the tuition to be more than trebled in many diploma schools. Further, potential nursing students whose fathers or brothers are union men are likely to investigate the eventual earning capacity of a graduate nurse as well as hours of work and prevailing personnel policies. Such prospective students are inclined to select a vocation offering the most benefits for their money. Most of those with ability and insight will select a school where they may earn college credits and which will best prepare them for career advancement.

NURSING EDUCATION IN MICHIGAN AT PRESENT

This state currently produces its nurse practitioners from four different types of preparatory programs. Individuals eligible to take the State Board examinations to become registered nurses may graduate from:

1) A two-year, junior or community college program with an associate in arts degree.

2) A three-year hospital school of nursing program with a diploma.

3 A four-year university or college program with a baccalaureate degree.

The fourth kind of nurse practitioner currently being prepared is the individual eligible by Mich-

CONTINUED ON PAGE 398

About This Article . . .

EDITOR'S NOTE—An article of this type to explain the new position taken on nursing education by the American Nurses' Association and the Michigan Nurses' Association was recommended by the MSMS Committee on Nursing to The Council.

The MSMS Council concurred in the Committee suggestion that *Michigan Medicine* carry such an explanatory article to interpret the Nursing Association's viewpoint on the changing direction of nursing education.

The co-authors are active in MNA.

Mrs. Pearse, R.N., is currently Director, Departments of Nursing and Nursing Education, Harper Hospital, Detroit. She is a graduate of the Harper Hospital School of Nursing and received her M.A. degree from Wayne State University. At the time this article was written she was co-chairman of the MNA-MSMS Liaison Committee, Chairman of the Nursing Service Administration Section of MNA and a member of the MNA Board of Directors.

Miss Phelps, R.N., is currently President, Director, and Resident Faculty Member, Center for Continuing Professional Study, Brighton, Michigan. She received her B.S. degree from State University, Iowa City, Iowa; M.S. Education degree from the University of Pennsylvania, Philadelphia; M.A. degree from Teachers College, Columbia University, New York. At the time this article was written, Miss Phelps was a member of the MNA-MSMS Liaison Committee (she now serves as co-chairman) and was a member of the Educational Administrators, Consultants & Teachers Section, Executive Committee which prepared the MNA "Action Plan for Future of Nursing Education in Michigan."

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his extended formula, completely ompatible with the infant, has emonstrated its advantages over lder modified-milk formulas in ntensive clinical tests.[1-4]

provides:

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ew Optimil provides protein, fat and rbohydrate in kinds and amounts ore consistent with the infant's eeds. Spitting-up is minimized and in integrity maximized.

PTIMUM GROWTH.
ew Optimil's superior nutritional lance of major nutrients and their mponents provides highest caloric ficiency. Optimum protein and min-al content assures lowest renal lute load.

Optimil is recommended as regular feeding for optimum growth and development of normal newborns; as an ideal supplement to or replacement for breast milk; as sound nutrition for prematures; and as prophylaxis against both essential fatty acid and nutritional iron deficiency.

Optimil, diluted 1 to 1 with water, provides a standard feeding formula–20 calories per oz. Supplied in new, convenient 16-oz. cans, Optimil is available for your specification at leading drug stores.

The complete Optimil system available to hospitals includes: 5% Glucose Water in presterilized 4-oz. disposable bottles • Optimil 13 calories/oz. Prepared Formula in 4-oz. disposable bottles* • Optimil 20 calories/oz. Prepared Formula in 4-oz. disposable bottles* • Optimil Concentrated Infant Formula in 16-oz. cans • Sterilized disposable nipples • Optimil Gift Pack: six 4-oz. disposable bottles of Optimil 20 calories/oz. Prepared Formula* and one 16-oz. can of Optimil Concentrated Infant Formula.

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1. Carson, M., and Hart, L.: "New Perspectives on Nutritional Aspects of Modified Milk-Fat Formulas," Colloquim held under the auspices of The Pediatric Department, Western Reserve University School of Medicine at Cleveland, Ohio, Sept. 8, 1966. Data available on request.

2. Hepner, R.: ibid. 3. Nichols, M.: ibid. 4. McCann, M.L.; Teree, T., and Wallace, W.; ibid.

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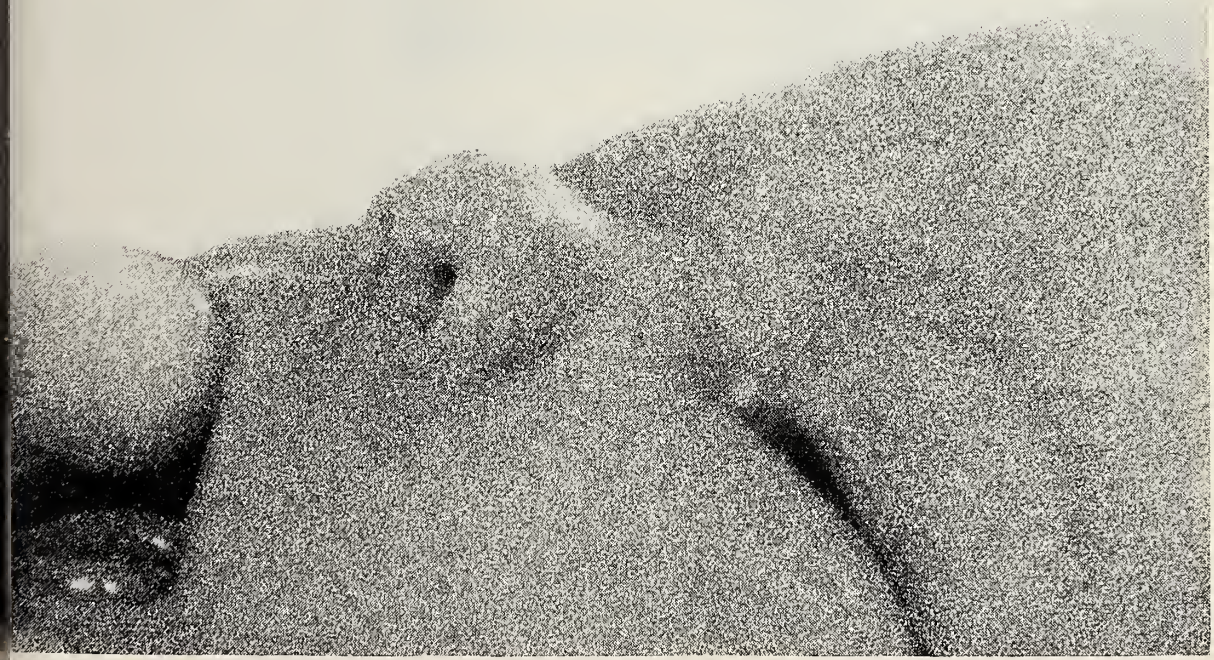

igan law to become a Licensed Practical Nurse. L.P.N.'s are products of a one-year training program.

As of September 1965, there existed in Michigan the following distribution of the differing types of educational programs for nurses:

Baccalaureate Degree	6
Associate Degree	12
Hospital Diplomas	21
Practical Nurse	30

Two additional baccalaureate programs in nursing hope to obtain approval and admit their first class of students in the fall of 1967.

Although a rapid growth in the supply of practical nurses is imminent, this cannot answer the need for registered nurses. As medical care becomes more complex, so does nursing care; and practical nurses are being asked to assume tasks and functions for which a one-year training program cannot prepare them. The fact that more practical nurses graduated in 1965 than did registered nurses raises grave questions about the quality of nursing care being rendered to patients.

A NUMBER OF Michigan's hospital schools of nursing are experimenting with accelerating the length of their traditional three-year program. Thirty-month, twenty-seven month and twenty-two month programs have been designed. In light of the previously mentioned explosion of knowledge, some authorities in general education are stating that the most useful thing students can be taught today is how to use their heads, and that this can be taught in less than three years. Mandatory for the graduates of any educational program in nursing is an intensive period of in-service education during which technical skill can be perfected and the confidence born of experience gained. It appears that many hospital schools of nursing are moving in the direction of the two-year community college program and that most hospital-conducted schools may eventually close as the community college movement gains impetus in Michigan. Charles Sellers, M.D., Detroit, in discussing the educational system in this country recently said "Under any circumstances it is almost a certainty that every young person in the United States should have the opportunity to complete a minimum of two years in a community college. Competition is getting keener."[2]

CONCLUSION

That nursing education is currently somewhat chaotic, nurses themselves would be the first to admit. In light of the profession's major concern, i.e., quality nursing care for patients; and in light of the need for more soundly based educational preparation for future nurse practitioners, the new directions for nursing education as offered in the introduction to this paper appear to be the only ones feasible for long range planning.

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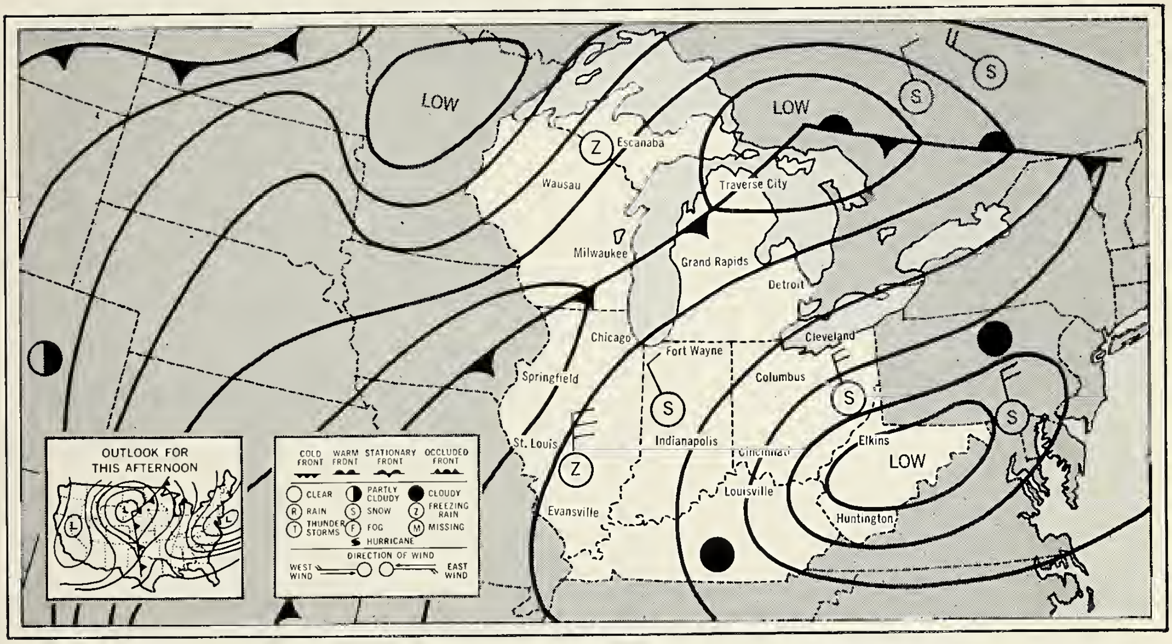
1. Lowell T. Coggeshall, *Planning for Medical Progress Through Education;* Evanston, American Association of Medical Colleges, 1965.
2. *Detroit Medical News,* November 28, 1966.

REGIONAL WEATHER FORECAST

Severe Snow Storms, Strong Winds and Bitter Cold Followed by Cough, Stuffed and Runny Noses and Aches and Pains.


LOW
LOW
LOW
Escanaba
Wausau
Traverse City
Milwaukee
Grand Rapids
Detroit
Chicago
Cleveland
Fort Wayne
Columbus
Springfield
Indianapolis
St. Louis
Cincinnati
Elkins
Louisville
Evansville
Huntington
OUTLOOK FOR THIS AFTERNOON
COLD FRONT
WARM FRONT
STATIONARY FRONT
OCCLUDED FRONT
CLEAR
PARTLY CLOUDY
CLOUDY
RAIN
SNOW
FREEZING RAIN
THUNDER STORMS
FOG
MISSING
HURRICANE
DIRECTION OF WIND
WEST WIND
EAST WIND

Tussagesic breaks up coughs, quickly clears stuffed and runny noses and relieves aches and pains. Provide coverage of the tough cold for up to 24 hours with just a single timed-release tablet dosed morning, midafternoon and at bedtime.

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Tussagesic®

timed-release tablet contains:

Triaminic® (phenylpropanolamine hydrochloride 25 mg., pheniramine maleate 12.5 mg., pyrilamine maleate 12.5 mg.)	50 mg.
Dextromethorphan hydrobromide	30 mg.
Terpin hydrate	180 mg.
Acetaminophen	325 mg.

Dosage: Adults—1 tablet, swallowed whole to preserve timed-release feature, in morning, midafternoon and at bedtime. *Side effects:* Occasional drowsiness, blurred vision, cardiac palpitations, flushing, dizziness, nervousness or gastrointestinal upsets. *Precautions:* The patient should be advised not to drive a car or operate dangerous machinery if drowsiness occurs. Use with caution in patients with hypertension, heart disease, diabetes or thyrotoxicosis.

DORSEY LABORATORIES • *a division of The Wander Company* • **LINCOLN, NEBRASKA**

Look how many ways **Thorazine®** brand of **chlorpromazine** can help

	Tranquilizer	**Potentiator**	**Antiemetic**
Agitation	●		
Alcoholism	●		●
Anxiety	●		
Cancer patients	●	●	●
Severe neurodermatitis	●		
Drug addiction withdrawal symptoms	●		●
Emotional disturbances (moderate to severe)	●		
Nausea & vomiting	●		●
Neurological disorders	●		
Obstetrics	●	●	●
Pain	●	●	●
Pediatrics	●	●	●
Porphyria	●	●	
Psychiatric disorders	●		
Hiccups—refractory	●		
Senile agitation	●		
Surgery	●	●	●
Tetanus	●	●	

'Thorazine' is useful as a specific adjuvant in the above named conditions.

The following is a brief precautionary statement. Before prescribing, the physician should be familiar with the complete prescribing information in SK&F literature or *PDR*. *Contraindications:* Comatose states or the presence of large amounts of C.N.S. depressants. *Precautions:* Potentiation of C.N.S. depressants may occur (reduce dosage of C.N.S. depressants when used concomitantly). Antiemetic effect may mask other conditions. Possibility of drowsiness should be borne in mind for patients who drive cars, etc. In pregnancy, use only when necessary to the welfare of the patient. *Side Effects:* Occasionally transitory drowsiness; dry mouth; nasal congestion; constipation; amenorrhea; mild fever; hypotensive effects, sometimes severe with I.M. administration; epinephrine effects may be reversed; dermatological reactions; parkinsonism-like symptoms on high dosage (in rare instances, may persist); weight gain; miosis; lactation and moderate breast engorgement (in females on high dosages); and less frequently cholestatic jaundice. Side effects occurring rarely include: mydriasis; agranulocytosis; skin pigmentation, lenticular and corneal deposits (after prolonged substantial dosages).

For a comprehensive presentation of 'Thorazine' prescribing information and side effects reported with phenothiazine derivatives, please refer to SK&F literature or *PDR*.

Smith Kline & French Laboratories SK&F

LAST MINUTE REMINDER:

Maternal Welfare Meeting to Offer Fine Program

Physicians are showing much interest in the Michigan Conference on Maternal and Perinatal Welfare to be held March 15-16 at the Pick-Durant Hotel, Flint.

W. W. Jack, M.D., Grand Rapids, chairman of the sponsoring MSMS Committee on Maternal Health, urges physicians who have not yet made reservations to attend the conference to plan to do so. The Clara Elizabeth Fund of Flint is cooperating again with the outstanding conference.

The program will feature six Michigan experts as well as two out-of-state authorities to provide new information about many of the problems surrounding childbirth.

Speaking on "Chronic Uterine Ischemia and Experimental Toxemia of Pregnancy" will be C. Paul Hodgkinson, M.D., Detroit. Doctor Hodgkinson is chairman of the Department of Gynecology-Obstetrics at Henry Ford Hospital.

"Respiratory Distress in Newborn Infants from Causes Other Than Hyaline Membrane Disease" is the topic of Robert H. High, M.D., Detroit, chairman of the Department of Pediatrics at Henry Ford Hospital.

Gordon C. Brown, Sc.D., Ann Arbor, professor of Epidemiology at the School of Public Health, the University of Michigan, has chosen "Viral Etiology of Congenital Heart Disease" as his subject.

Speaking on "Changing Indications for Therapeutic Abortion" will be J. Robert Willson, M.D., Ann Arbor, professor and chairman of the Department of Obstetrics and Gynecology at the University of Michigan.

"Unusual Causes of Maternal Mortality" will be the subject of Ronald H. Nishiyama, M.D., Ann Arbor. Doctor Nishiyama is assistant professor of Pathology at the University of Michigan.

David G. Anderson, M.D., Ann Arbor, associate professor of Obstetrics-Gynecology at the University of Michigan, will speak on "Amniotic Fluid Embolism — Diagnosis and Management."

MSMS Council Supports Fine Work of SAMA

The MSMS Council has taken action to join the Student American Medical Association's Sustaining Membership Program and pledge $100 to the Program.

Designed to provide SAMA with unrestricted income with which to further its activities, membership is open to individual practitioners, county, state, and national medical organizations, and the pharmaceutical industry. The Michigan State Medical Society is the eleventh state medical society to participate in the project.

Wayne Alumni Day Set May 17

The Wayne State University School of Medicine Alumni Association will hold its 99th Annual Clinic Day and Alumni Reunion Banquet, May 17, at the Sheraton-Cadillac Hotel, Detroit.

Events include scientific programs, Alumni Association meetings, presentation of Golden Anniversary Diplomas to members of the Class of 1917, the awarding of citations and other honors, and a dinner dance.

All doctors of medicine are cordially invited to participate in the Clinic Day Program. Banquet reservations are available from Alumni House, Wayne State University.

Registrants preferring to stay at the Sheraton-Cadillac Hotel should mention the Wayne State Medical Alumni Clinic Day in their requests for reservations.

DID YOU KNOW . . . that Michigan Blue Cross returned in 1965 a higher percentage of subscriber dollars in health care benefits than any of the nation's 25 leading insurance companies.

Blue Cross President Wm. S. McNary said that Blue Cross paid $218 million in benefits for hospital care. This was more than 96 percent of the income ($227 million) received from its more than four million members.

Nationally, Blue Cross and Blue Shield Plans averaged six percent.

With the help of Lansing physicians, a group of Lansing area high school boys have organized Medical Explorers units to study medicine with their meetings at the MSMS Headquarters. Left to right are Carl West, M.D., Lansing; Calvin Mack, Robbie Higgins, Terry Wainwright and Joseph Cipporone, M.D., Lansing.

Lansing Physicians Help Inspire Medical Explorers

A group of 25 young Lansing high school students, interested in the field of medicine, are meeting regularly at the headquarters of the Michigan State Medical Society.

Carl West, M.D., Lansing, is chairman of a committee of 10 doctors in the Greater Lansing area who are interested in giving these young men firsthand information about the field of medicine.

The boys — called Medical Explorers — saw a movie at their first meeting about the education of a medical student and listened to Richard Bates, M.D., of Lansing, speak on what it is like to be a doctor.

The Lansing Medical Explorer group is one of 300 which the Boy Scouts of America have established around the country because of the high interest in medical careers among young men.

A full winter program for the Explorers has been planned by the committee involving talks by specialists, general practitioners, and medical administrators. Several field trips are also planned.

Joseph Cipparone, M.D., a committee member, serves as advisor to the Medical Explorers and attends all meetings.

MARMP Awaits Word on Request

Leaders of the Michigan Association for Regional Medical Programs are awaiting the outcome of their application for a $1 million planning grant from the National Institutes of Health, Washington, D.C.

The non-profit MARMP corporation is established to plan and implement a statewide cooperative attack on heart, cancer, and stroke.

The Michigan State Medical Society is one of 20 participating groups on the MARMP Advisory Committee. Don Marshall, M.D., Kalamazoo, was appointed by The Council to represent the Medical Society, with D. Bonta Hiscoe, M.D., Lansing, as alternate.

MARMP was organized to request funds and operate programs after Congress passed Law 89-239 which provides funds for such programs of research, training, continuing education, and demonstration.

SERVICES GROUP MEETS

The first meeting of the Medical Facilities and Services Subcommittee of the new Committee of Forty of the Michigan Community Health Services Study recently met in Detroit with Robin Buerki, M.D., Detroit, Chairman.

The Study is a joint project of the Michigan Health Officers Association, Michigan Department of Public Health and the University of Michigan School of Public Health.

MUST NOTIFY IRS

"Physicians are reminded that it is necessary under the present law to notify the Director of Internal Revenue of any change in the address of their office. Failure to do so renders them liable to additional tax and a penalty not to exceed 25% of the amount of such tax, and they may incur criminal liability for carrying on business without payment of tax. (Section 151.103-151.106 inclusive. Narcotic Regulations No. 5)."

Seeks to Begin Detroit Museum Of Negro History

BY PETER HOHEISEL
OF THE MSMS STAFF

"In schoolrooms, in churches, in the popular press, the Negro and his fellow Americans have not been told the truth about the contributions of Black Men to the New World. The tragedy is that there have been generations of Negroes who have no knowledge of their historical identity and little sense of pride in being descendants of African peoples," says Charles Wright, M.D., Detroit.

WRIGHT

To remedy the lack of knowledge in the Negro about his own history, Doctor Wright is active in supporting the establishment of a Negro history museum in Detroit. As Chairman of the International Afro-American Museum, Inc., Doctor Wright hopes to collect in the museum objects and documents of historical value which could be lost in the process of cleaning out an attic.

"We think there are valuable documents stored in trunks and basements all over the area. And since people have learned of our project they have come to us with them — some dating from the Civil War," he said.

"The job of the Afro-American at this point in time is not to become a white man with a dark skin, but to become himself, in short to discover his own identity. This is precisely what the International Afro-American Museum project is all about, uncovering the identity of the American Negro, so that our children will not be victims of self-hatred at three years of age," Doctor Wright points out.

Urges Regional Centers For Continuing Education

Delegates to the 63rd Annual AMA Congress on Medical Education in Chicago heard a series of current reports and recommendations, including a suggestion that regional centers for continuing education of doctors be established to insure that new scientific knowledge is put to use.

The suggestion came from William N. Hubbard, Jr., M.D., President of the Association of American Medical Colleges and Dean of the University of Michigan Medical School.

MICHIGAN PHYSICIANS speaking at the Feb. 9-15 congress, in addition to Doctor Hubbard, included C. Gardner Child, M.D., chairman of the Department of Surgery at the U. of M. Medical School, and Bernard A. O'Hora, M.D., of Midland, member of State Board of Registration in Medicine.

Addressing the Federation of State Medical Boards of the U.S., Doctor Hubbard urged creation of "regional continuation education centers that are related to the university but are staffed and operated principally by the professionals in the community."

He noted that continuing education is primarily the responsibility of each physician and further suggested development of special clinical information centers similar to poison control information centers.

DOCTOR HUBBARD ALSO proposed pilot studies to determine the cost-benefit ratios of two-way radio and television conferences, and urged development of a set of examinations "which test the currency of the physician's knowledge and understanding."

Many Michigan physicians attended the annual Medical Educational Conference. Don Marshall, M.D., MSMS Councilor from Kalamazoo and Chairman of the MSMS Education Liaison Committee, was the official MSMS Council representative.

Rubella Vaccine Researcher Coming For GP Clinic

A noted scientist who did research on the new Rubella vaccine heads a list of speakers for the 21st Annual Postgraduate Clinic to be presented by the Michigan Academy of General Practice March 15 and 16 at the Sheraton-Cadillac Hotel in Detroit.

Victor J. Cabasso, Sc.D., head of Virus Immunological Research, Pearl River, New York, will discuss "A New Rubella Vaccine" at 9:40 a.m. Wednesday, March 15.

Featuring five concentrated clinical courses, the clinic is open to all physicians. There is no registration fee.

Among the other highlights during the clinic will include "Current Developments in Oral Contraceptives," by Edward T. Tyler, M.D., obstetrics-gynecology, Tyler Clinic in Los Angeles, at 1:30 p.m., March 15; "Breast Cancer — Diagnosis, Treatment and Prognosis," by Thomas W. Botsford, M.D., associate clinical professor of surgery, Harvard Medical School; and "Ophthalmology and the Family Physician," by Malcolm A. McCannel, M.D., clinical associate professor, Department of Ophthalmology, University of Minnesota Medical School.

The concentrated clinical courses, or "instruction in depth," will be conducted at 3:30 p.m. March 16.

Every Week Is Old Home Week For Dr. Hudson

There can be no doubt that Michigan is the second home for AMA President Charles L. Hudson, M.D. — almost every week he is in the state presenting a major address to some important organization.

His recent schedule, for example, included the Economic Club of Detroit, the Wayne County Medical Society, the Galens Honorary Medical Society at the University of Michigan, and others. And he'll be back for the American Psychiatric Association on May 10 in Detroit, for the National Council of Alcoholism, on April 11-14, in Flint and others.

In his appearances, Doctor Hudson often recalls his boyhood at Merrill, his days at Alma College and his medical school training at the University of Michigan. At the Galens Banquet, for example, he remembered his service as president of the Galens back in 1930.

While he must spend considerable time at the AMA headquarters in Chicago and on speaking tours, he still tries to stay in Cleveland as much as possible.

In his comments before the Wayne County Medical Society, Doctor Hudson suggested, "We must continue the dialogue with government to find out where government and the private sector can cooperate harmoniously."

"I would like to have private physicians to be leaders in concern for taking care of the segment of the population which may not be getting the best medical care. No one in this country should go without the best medical care. I would like the people of this country to see that as an organization we have the same kind of concern for the people that the individual physician has."

Luther Leader, M.D., Past-President of MSMS and a Delegate to the AMA, commenting on the talk said, "His explanation of what our problems are and how we must go about solving them was excellent. From the comments made by the audience, I would conclude that the talk was most valuable to everyone there."

Doctor Hudson, in his talk to the Galens, said the major forces influencing medical practice today are government, community, and the medical profession itself.

Pointing to the millions of persons now eligible for government-assisted medical care, Dr. Hudson said government would "without a doubt adversely affect the relationship of physician and patient, would restrict the physician in his practice, would affect the satisfactions of the physician, and in this way, would adversely influence the supply of physicians."

Welcoming AMA President Charles L. Hudson, M.D., as he arrives to deliver the Galens Honorary Medical Society Lecture, February 14 in Ann Arbor, is Charles Newton, Galens' president. Looking on are, at far left, Bradley M. Harris, M.D., Ypsilanti, MSMS President-Elect, and, at far right, Gene Rontal, chairman of the event. Newton and Rontal are both students at the University of Michigan Medical School.

One of the two 1967 Wayne State University professors selected to receive the Fifth Annual Probus Club Awards for Academic Achievement was A. Martin Lerner, M.D., associate professor of medicine at the School of Medicine. He received a $500 grant, without restrictions, at the Annual Probus Award Dinner.

Work to Begin On PG Center for U-M Medical Center

Construction will begin this month for the Center for Continuing Medical Education at the University of Michigan.

The Regents have approved a general construction contract and a project budget of $1,930,000 to build a facility at the U-M Medical Center.

The center will contain an auditorium seating nearly 550, a 120-seat lecture room, three classrooms, a large exhibition area, and registration and office facilities.

The new center will be located just east of the C. S. Mott Children's Hospital, now under construction.

The Center for Continuing Medical Education was made possible by a $1 million gift from the Harry A. and Margaret D. Towsley Foundation of Ann Arbor and a $750,000 gift from the Herbert H. and Grace A. Dow Foundation of Midland. These gifts are part of the U-M $55-Million Program.

To Stress Family Life Education

Family Life Education will be in the spotlight during April and May in Michigan as the Michigan State Medical Society takes a leadership role in coordinating special efforts of groups in such fields as education, health, youth, religion and others.

The MSMS educational efforts will be directed by a special Committee on Lay Education of the Committee on Maternal Health with representatives from outside organizations and agencies as special advisors and consultants.

James E. Harryman, M.D., Muskegon, is chairman of the committee for the Family Life Education project; appointed by Wm. W. Jack, M.D., Grand Rapids, Chairman of the Committee on Maternal Health.

The Committee emphasizes that many organizations throughout the state are exploring the means of establishing a Family Life Education program, and added, "It is our purpose to coordinate the efforts of these agencies and to bring them into concert so that a Family Life Education program of merit will be integrated into the Michigan State educational system."

The Committee has defined Family Life Education as "a positive approach to strengthening the family for its vital tasks for nurturing healthy personalities, developing sound values and fostering satisfying, constructive human relations."

The main thrust of the Committee work will be to reach the medical profession, teachers, and the public through the many already existing agencies.

Physicians will be reached through programs in medical schools to make physicians aware of the services existing in their communities. Also certain members of the committee are preparing material for use by the MSMS Committee on Public Relations and the Committee on Scientific Radio. The various branches of the county medical societies will also be reached. *Michigan Medicine* plans a cover and an article to coincide with the spring educational effort.

Teachers will be reached by the Committee through the universities, the school systems, and in-service training programs. Special emphasis will be placed on training senior high school teachers to integrate every class as it relates to life and Family Life Education.

To reach the public, Committee members have been appointed as liaison to many organizations such as the Michigan Department of Public Health, the Department of Education, Michigan Youth Commission, the Council of Churches, the State Human Resources Council, YMCAs, YWCAs, and other groups.

Auxiliary Calls Attention Now to Fall Art Show

Doctors and their wives who are Sunday (or weekday) artists should start now to prepare their work for the Seventh Annual Doctors and Wives Art Show to be held September 27-29 at the Pantlind Hotel, Grand Rapids. Once again, the show will be a part of the MSMS Annual Session.

Entries are limited to members of the Michigan State Medical Society and their wives. All work must be the original work of the entrant. Each person is limited to four entries.

Mrs. Lloyd A. Kammeraad, Grand Rapids, chairman of this year's show, reports that there will be seven classes of competition:

I. PAINTING: oil, polymer, encaustic acrylic, lacquer, etc.

II. PAINTING: watercolor, casein, tempera, pastels, gouache.

III. SCULPTURE: wood, stone, ceramic, metal.

IV. CERAMICS.

V. DRAWING AND GRAPHIC ART: all print techniques.

VI. THREE-DIMENSIONAL DESIGN: weaving, stitchery, jewelry.

VII. PHOTOGRAPHY.

Paintings must be framed. Water colors, drawings, and prints must be matted or framed. Framed entries must be equipped with eyelets or wire suitable for hanging.

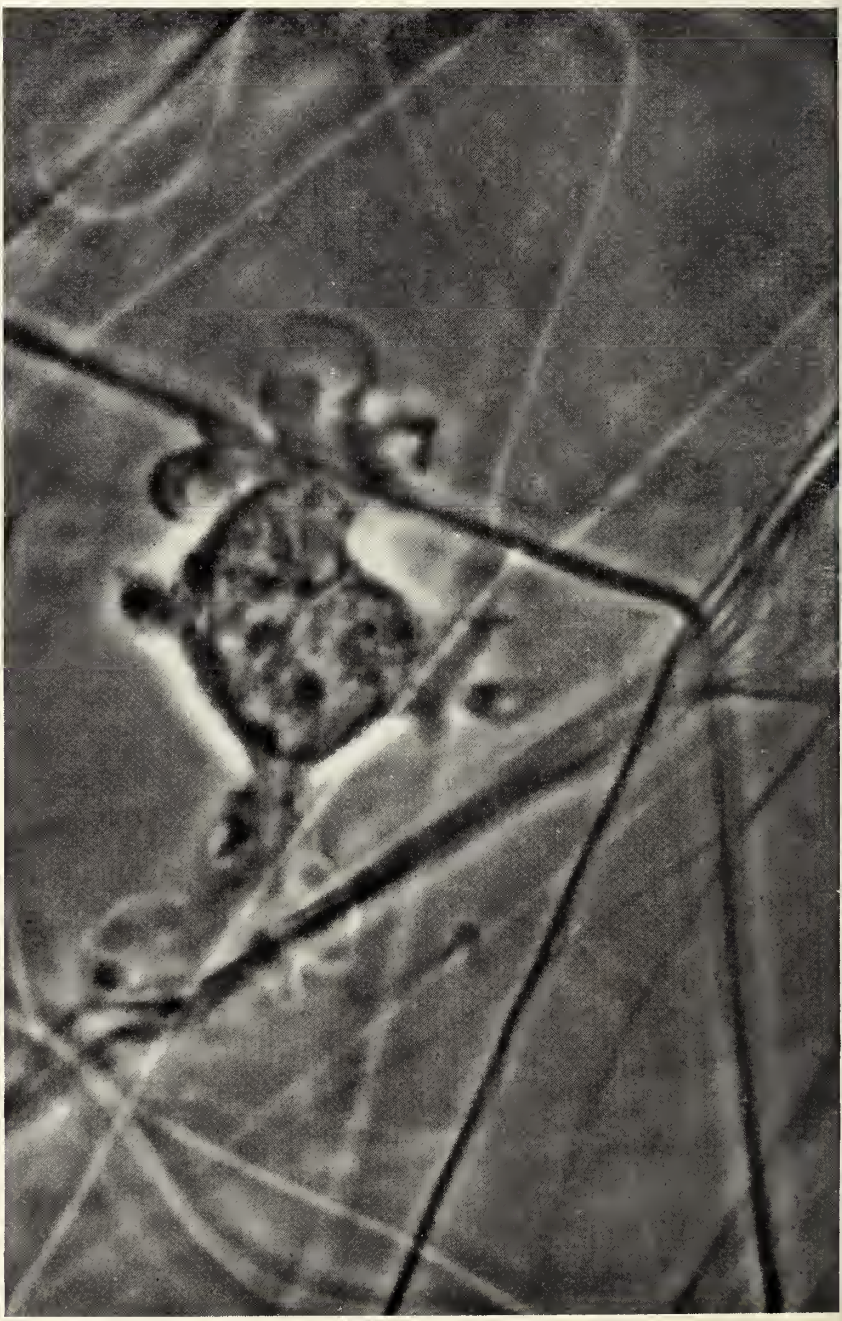
Mrs. Kammeraad and Co-chairman Mrs. Robert Westerhoff, Grand Rapids, urge physicians and their wives to begin now preparing their work to enter in this year's show.

INFLAMMATION: A cellular fight for life

A SYNTEX REPORT based on recently developed hypotheses about topical corticosteroids, including the cellular theories of inflammation by Thomas F. Dougherty, Ph.D., University of Utah.

You are looking at a fibroblast fighting for life. This cell – one of the most common found in connective tissue – has literally been poisoned by cytotoxins released from other cells that have ruptured. Soon, if the abnormal activity of this fibroblast does not cease, it, too, will rupture and die – one more casualty in the inflammatory wave of destruction precipitated by injury.

Until a short time ago no one had ever witnessed such a scene at the cellular level. Now, through advanced cinemicrographic techniques, it is possible to view and photograph the inflammatory process as produced experimentally in living animal tissue. This method permits new insight into the mechanism of inflammation and the role of corticosteroids in therapeutic management. Equally important, these techniques shed new light on factors that may make one corticosteroid more effective than another – factors that can be correlated with other chemical, biologic, and clinical parameters.

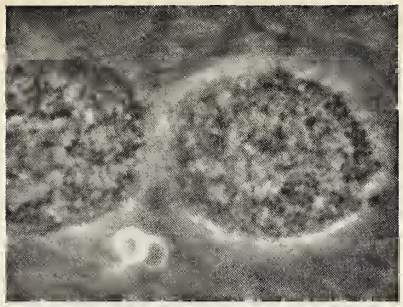


Visual evidence of how corticosteroids influence the inflammatory reaction

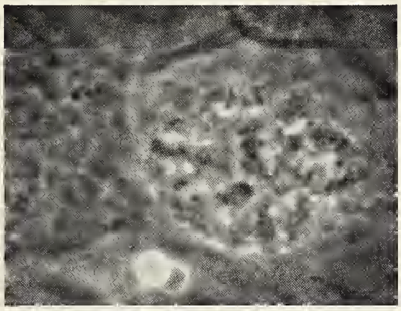
Working with phase-contrast cinemicrography on living animal tissue, Doctors Thomas F. Dougherty and David Berliner of the University of Utah College of Medicine have actually filmed cellular events that occur during the inflammatory reaction. This remarkable study* and additional work by these investigators, as well as by others, have established a new theoretical biologic basis for the antiinflammatory effect of the corticosteroids. (It must be noted that other theories, such as the lysosome or so-called "suicide bag" theory, have been postulated, although it is quite likely that there are more similarities than differences among the various theoretical models.)

The inflammatory wave of destruction

In this investigation an injurious injection of gelatin is used to set off an inflammatory reaction in living mouse tissue. What follows is a wave of destructive cellular activity that comprises the inflammatory response to injury. Mast cells (which contain heparin, serotonin and histamine) take up water, swell and rupture, releasing their contents, which are toxic outside the mast cell wall. These toxins, in turn, cause disintegration of other cells (such as fibroblasts) and the release of additional toxic material. Capillaries, too, take up water and leak unformed blood elements, causing edema. And polymorphonuclears, lymphocytes and perithelial cells invade the inflamed site. As a result of all these changes, the cellular environment reaches a state of turmoil.



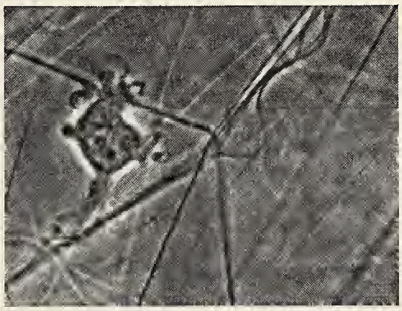
Phase-contrast microscopy showing mast cell before injury.



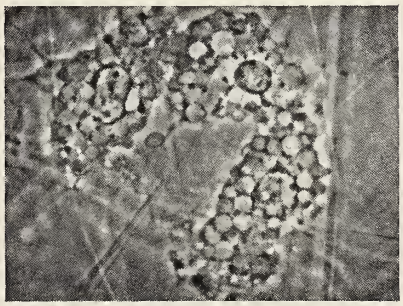
Mast cell (after injury) has broken up and released cytotoxins.

How corticosteroids change the picture

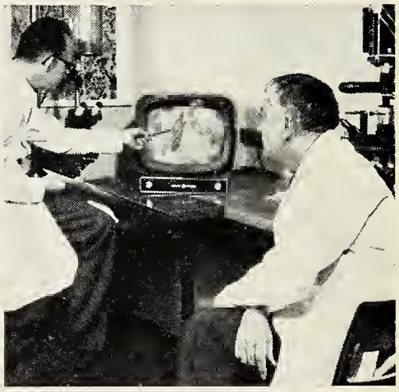
Corticosteroids appear to virtually stop the abnormal cellular activity that constitutes the inflammatory reaction. This permits the body's natural resources to clear up the inflamed area and repair the damaged tissue. This interpretation is supported by the fact that when the injurious gelatin solution is injected simultaneously with a corticosteroid – Synalar (fluocinolone acetonide) – the inflammatory pattern simply does not develop.



Fibroblast in high state of activity, much distorted.



Mast cells showing effects of corticosteroid action: cells are normal in size, shape and activity.



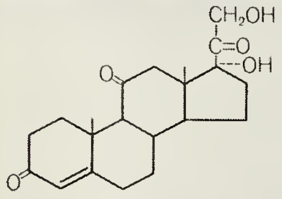
In summarizing his study Doctor Dougherty states: "...we also feel this work may explain why one corticosteroid helps a patient more rapidly and effectively than another. If it does, it is because one corticosteroid is the fastest, most effective inhibitor of the series of inflammatory events at the tissue level."

A New View of Corticosteroid Action in Inflammatory Dermatoses, a film based on this study, is now available from your Syntex representative.

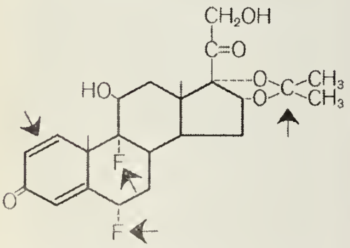
See last page for contraindications, precautions, side effects and dosage.

How advances in chemical design have achieved greater steroid potency

The chemical modification of corticosteroid molecules from the advent of hydrocortisone to the development of Synalar (fluocinolone acetonide) is a prime example of how biochemists can "design" to increase therapeutic activity and minimize undesirable side actions. Below, for example, we see the important changes that were made in reference to the hydrocortisone molecule to produce fluocinolone acetonide, one of the most active of all topical corticosteroids. As a result, a 0.01% preparation of Synalar (fluocinolone acetonide) has been reported to do the work of a 1% hydrocortisone product containing 100 times more cortiscosteroid. And it can often do it more effectively.



Hydrocortisone

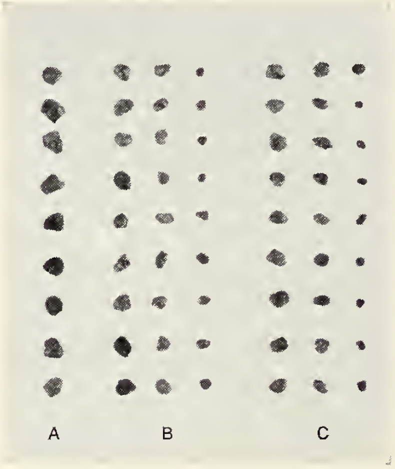


Fluocinolone Acetonide (Synalar)

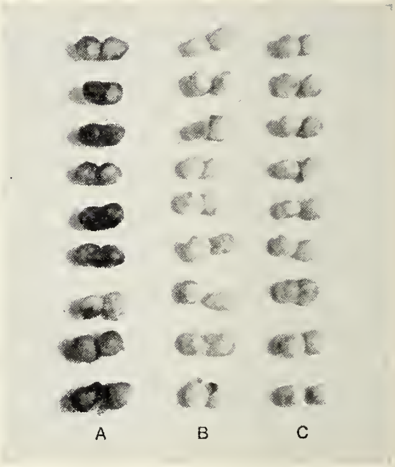
- ☐ *a double bond between carbons 1 and 2*
- ☐ *fluorine substitutions at both the 6-α. and the 9-α positions*
- ☐ *the addition of the acetonide at the 16-α, 17-α positions, thus providing one of the most potent topical corticosteroids available.*

How bioassay tests are used to "predict" therapeutic potential

Biologic assays are another tool used by researchers to help establish the relative activity of corticosteroids. To date no single method of assaying corticosteroid activity has emerged as the ideal "yardstick" for predicting therapeutic potential. Taken together, however, these methods have proved useful. When such tests are run on various corticosteroids, a definite order of corticosteroid activity becomes evident. Compounds with the highest order of activity may be expected to merit clinical trial to establish their high therapeutic potential. When assayed by these methods, fluocinolone acetonide (Synalar) emerges as one of the most active topical corticosteroids, milligram for milligram, available for clinical application today.



The Thymus Involution Assay[1-4] is run on adrenalectomized rats. The sizes of the glands are measured, and the degree of involution caused by the steroid is determined as an indication of its potency. In the above photo, the comparative involution of thymus glands achieved with hydrocortisone and Synalar (fluocinolone acetonide) is shown. Untreated controls (A) show normal size. Group B – injected with 1, 2 and 4 mg. of hydrocortisone – show progressively smaller thymuses as does Group C – injected with fluocinolone acetonide – but with only 1/500th the dose of hydrocortisone.



The Antigranuloma Assay[1-4] also utilizes adrenalectomized rats. Granulomas are induced by subcutaneous implantation of cotton pellets on either side of the thorax. The degree of granuloma inhibition achieved by a steroid reflects its potency. The above photo shows the inhibition of granuloma formation achieved with hydrocortisone and Synalar (fluocinolone acetonide). Untreated controls (A) show large, red granulomas adhering to the pellets. Group B, receiving hydrocortisone and Group C, receiving fluocinolone acetonide, show little, if any, granuloma formation. Fluocinolone acetonide produced the same effect as hydrocortisone with only 1/500th the dose. This assay, as well as the thymus involution assay, measures systemic rather than topical corticosteroid activity. Nevertheless, results by these methods correlate well with other assays and with the milligram potencies of topical steroids in current clinical use.

Worldwide clinical experience confirms the predictable therapeutic potential of Synalar

It is particularly gratifying that the promise of the advanced chemical design and high order of bioassay activity of Synalar (fluocinolone acetonide) has been confirmed by widespread therapeutic application. Indeed, the impressive clinical response rate of Synalar has been documented in no fewer than 232 papers from 22 countries.

Representative Clinical Results with Synalar*

Efficacy Documented in over 4,000 Patients

Condition	Number of Publications	Number of Patients	Significant Improvement†
Contact Dermatitis	27	750	713
Eczematous Dermatitis	21	472	409
Seborrheic Dermatitis	18	442	426
Atopic Dermatitis	24	460	426
Psoriasis	36	1,699	1,510
Neurodermatitis	18	351	324
Total	144	4,174	3,808

*Complete bibliography on request.

†Expressed by the authors as excellent, very good, good, complete remission of inflammation, etc.

PRESCRIBING INFORMATION
For initiation of therapy: Cream 0.025%, 5 and 15 Gm. tubes, 425 Gm. jars; *for emollient effect:* Ointment 0.025%, 15 Gm. tubes; *for maintenance therapy:* Cream 0.01%, 15 and 45 Gm. tubes, 120 Gm. jars; *for intertriginous or hairy sites:* Solution 0.01%, 20 cc. and 60 cc. plastic squeeze bottles; *for infected inflammatory dermatoses:* Neo-Synalar® Cream (0.025% fluocinolone acetonide, neomycin sulfate, equivalent to 0.35% neomycin base), 5 and 15 Gm. tubes.
CONTRAINDICATIONS: Tuberculous, fungal, and most viral lesions of the skin, (including herpes simplex, vaccinia, and varicella). Not for ophthalmic use. Contraindicated in individuals with a history of hypersensitivity to any of the components. PRECAUTIONS: Synalar preparations are virtually nonsensitizing and nonirritating. However, the solution may produce burning or stinging when applied to denuded or fissured areas. In some patients with dry lesions, the solution may increase dryness, scaling or itching. While topical steroids have not been reported to have an adverse effect on pregnancy, the safety of their use on pregnant females has not absolutely been established. Therefore, they should not be used extensively on pregnant patients, in large amounts, or for prolonged periods of time. Prolonged use of any antibiotic may result in overgrowth of nonsusceptible organisms; if this occurs, appropriate therapy should be instituted. When severe local infection or systemic infection exists, the use of systemic antibiotics should be considered, based on susceptibility testing. SIDE EFFECTS: Side effects are not ordinarily encountered with topically applied corticosteroids. As with all drugs, however, a few patients may react unfavorably to Synalar under certain conditions. The neomycin in Neo-Synalar Cream rarely produces allergic reactions.

REFERENCES: 1. Lerner, L. J., Bianchi, A., Turkheimer, A. R., Singer, F. M., and Borman, A.: Anti-inflammatory steroids: potency, duration and modification of activities. Ann NY Acad Sci 116:1071 (Aug. 27) 1964. 2. Idem: Comparison of anti-granuloma, thymolytic and glucocorticoid activities of anti-inflammatory steroids. Proc Soc Exp Biol Med 116:385 (June) 1964. 3. Ringler, A.: Activities of adrenocorticosteroids in experimental animals and man, in Dorfman, R. I.: Methods of hormone research, New York, Academic Press, 1964. vol. III. pp. 234-280. 4. Gubersky, V. R.: To be published.

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For inflammatory dermatoses...
by any measure
a topical corticosteroid
of choice

Synalar®
(fluocinolone acetonide)

Milligram for milligram one of the most active topical corticosteroids available

Rapid and predictable in antiinflammatory and antipruritic activity

Results often comparable to those of systemic corticosteroids with fewer hazards

(EDITOR'S NOTE: It is an understatement to say that considerable interest is being shown in Michigan now in medical education. MSMS, the Michigan State Board of Education, the Citizens Committee on Education for Health Care and other groups are urging further expansion at the University of Michigan and Wayne State University Medical Schools and the expansion of the new two-year program at the Michigan State University College of Human Medicine to a full degree-granting medical school. The following latest statistical information is excerpted from the Annual Report of the American Medical Association Council on Medical Education in Vol. 198, No. 8 of JAMA. MSMS members are invited to send their views on medical education to the MSMS Education Liaison Committee.)

Medical Education Facts: How Many Schools? Applicants? Expenditures? Future Plans?

The number of medical schools in active operation remained at 88 for the 1965-66 academic year. Of these, 87 were fully accredited schools, 84 offered the full four-year program, and three were accredited as two-year schools of the basic medical sciences. The remaining school, New Mexico, was still classed as a school in development. (Page 179)

Of the current 88 schools, 51 plan to increase the size of the entering class by more than five students prior to 1971. (Page 193)

TOTAL ENROLLMENT of the 88 medical schools in the nation continued to rise slightly to the new high of 32,835, an increase of 407 during the year. In the past 35 years the average annual increase has been 310, but has been as high as 931; and once (right after World War II), enrollment dropped by 812 in one year. No "new" schools were added during the year, most of the increase being in the upper classes of existing schools. (Page 192)

Four schools expect to admit their first classes in the fall of 1967: Arizona, Hawaii, Penn State-Hershey, and South Texas. Three others, California-Davis, California-San Diego, and Connecticut, plan to admit students in the fall of 1968; Louisiana State-Shreveport is aiming for 1968 or 1969; Massachusetts, Mt. Sinai, and Toledo for 1970; and SUNY-Stony Brook for 1971. (Page 179)

TEN STATES accounted for 56% of the entering medical school students in 1965-1966 and the five leading states (New York, Pennsylvania, California, Illinois, and Ohio) contributed 38%. New York alone, with 1,329 students, contributed more than twice as many as the next highest state, Pennsylvania, with 600 students. New Jersey, Michigan, and Texas were sixth, seventh, and eighth in 1965 with 382, 344, and 342 students respectively. New students entering medical schools from the several states remain fairly constant from year to year. (Page 193)

The distribution of A, B, and C averages among medical school entrants has been reported for more than 12 years, without showing any very marked trend. About 11% have recently had a C average and about 13% an A average, compared with 10% and 21%, respectively, 13 years ago. This year's figures of 10.6% and 12.7% for C and A averages are hardly startling. Three schools matriculated no students with A averages, and 11 accepted no C average applicants. However, a total of 35 schools had entering classes with less than 5% in the C average category, and 72 schools had more than 5% of the entering class in the A average group. These figures, while presented somewhat differently than before, represent no significant change in recent years. (Page 194)

In 1965-66 the number of unfilled medical school faculty positions exceeded 1,000 for the first time. The unfilled positions totaled 1,115, an increase of 160 over the previous year's 955 with 443 vacancies reported in basic science departments and 672 in clinical departments. (Page 189)

The following information about Internships in Michigan is quoted from *JAMA,* Vol. 198, No. 8:

46 — No. of approved programs.

37 — No. of hospitals.

572 — No. of internships offered September 1, 1965.

372 — No. of internships filled September 1, 1965.

200 — No. of internships vacant September 1, 1965.

65% — Percentage filled.

112 — No. of foreign interns on duty September 1, 1965.

30% — Percentage of foreign interns in filled positions.

634 — No. of internships offered 1967-1968. (Page 878)

IN COMPARISON with the figure for the previous year, the overall average of $3,797 for interns is an increase of $268 annually. The average salary for affiliated hospitals was $3,578, or $333 more, whereas for the nonaffiliated hospitals the average was $4,071, or an increase of $364 per year. (Page 207)

The following information about Residencies in Michigan is quoted from *JAMA,* Vol. 198, No. 8:

202 — No. of approved programs.

53 — No. of hospitals.

1,832 — No. of residencies offered September 1, 1965.

1,532 — No. of residencies filled September 1, 1965.

300 — No. of residencies vacant September 1, 1965.

84% — Percentage of residencies filled September 1, 1965.

525 — No. of foreign residents on duty September 1, 1965.

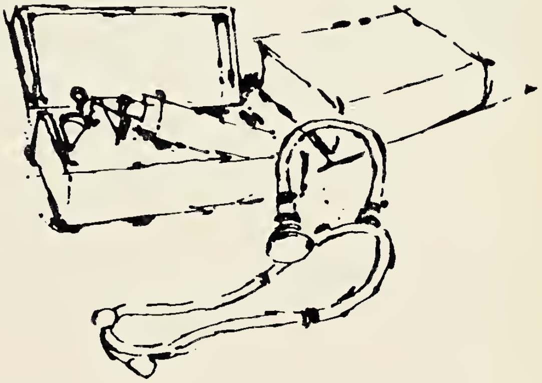
35% — Percentage of residencies filled by foreign residents September 1, 1965.

1,914 — Total residencies offered September 1, 1965. (Page 885)

The total medical school expenditures in 1964-65 in the nation was $778,700,296 an increase of $83,014,392 or 12% over 1963-64. (These figures are for 87 of the 88 schools. Figures for 1965-66 are not available as yet.)

The four-year medical schools spent an average of $9,210,683.

Federal funds comprised 54% of the total medical school expenditures in 1964-65, compared to 30% in 1958-59. (Pages 200, 201)



Physicians to Help Mark Michigan Week

BY ALICE SNELGROVE
OF THE MSMS STAFF

Michigan physicians are urged to begin now making plans for active participation in Michigan Week, May 21-27.

Physicians have a special opportunity to help Michigan and the medical profession this year as the professions take an active role in Michigan Week. Leading this effort is Hugh W. Brenneman, MSMS Executive Director, who is chairman of the Section for the Professions for Michigan Week.

The purpose of the annual Michigan Week is to promote Michigan, its people, its products, its land — in short, to make Michiganians proud of their state.

Michigan Week provides a two-way opportunity: Michiganians can promote their state by promoting their professions, and by promoting their professions they promote Michigan.

In achieving this dual goal physicians can work on a state, community, individual level, or all or any combination of the three. In every case Michigan physicians have much of which to be proud: Michigan is the "Health Capital of the World," having two major medical schools, two major pharmaceutical firms, many leaders in the American Medical Association and related professional organizations; Michigan has generously contributed money, drugs, and manpower to Project Hope; Michigan physicians have actively participated in the AMA's Volunteer Physicians for Viet Nam, etc., etc., etc.

The Michigan State Medical Society is now planning its activities for Michigan Week. Its first aim is to urge physicians to make their own contributions to Michigan Week and to promote Michigan whenever an opportunity presents itself.

The first step is individual commitment — a physician's contribution to speak for Michigan in his practice, his hospital, his professional organizations and associations. The possibilities are unlimited. By promoting Michigan and the medical profession, physicians in turn help themselves.

MSMS OFFICIALS SPEAK

The annual meeting of the Lenawee County Medical Society featured talks by B. M. Harris, M.D., Ypsilanti, President-Elect of MSMS, and Harold F. Falls, M.D., Ann Arbor, MSMS Councilor for the 14th District.

Values in Voluntary Effort Stressed at Marquette Meeting

Procedures for the organization of the first subregional zone council of the Upper Peninsula Health Facilities Planning Council were discussed recently at a meeting at Marquette.

Alan Barth, Executive Director of the Michigan Hospital Association, and John A. Doherty, Executive Director of the Michigan Health Council, both of Lansing, gave the main talks.

Mr. Barth spoke on the history of the Michigan Health Facilities Planning Council and the need for establishing a voluntary planning council in all areas of Michigan. Mr. Doherty stressed how voluntary planning on a regional basis can eliminate unnecessary duplication of hospitals and nursing homes in an area as well as facilitating the full use of available medical personnel.

The Marquette meeting drew representatives from the county medical societies, hospitals, nursing homes, and area business and industry. Rev. Paul Landstrom, Marquette, is Chairman of the Zone 3 Council.

SMALLPOX CERTIFICATE NEEDED IF TRAVELING ABROAD

All Michigan physicians who are planning vacations abroad this year must remember that new smallpox certificates are required for international travel.

Certificates issued prior to January 1 will continue to be valid for the period they previously covered, which is three years for travelers returning from abroad.

A new printed form is now available. The new certificate must be completed by a physician, and must include his written signature. The certificate must be authenticated by the local or state health officer in the area in which the immunizing physician practices.

The full ¼ grain of phenobarb in the formula
takes the nervous edge off the pain
...helps bring out the best in codeine

Phenaphen® with Codeine the only leading compound analgesic that calms instead of caffeinates

Each capsule contains:

Phenobarbital (¼ gr.)	16.2 mg.
(Warning: may be habit forming)	
Aspirin (2½ gr.)	162.0 mg.
Phenacetin (3 gr.)	194.0 mg.
Hyoscyamine sulfate	0.031 mg.
Codeine phosphate	¼ gr. (No. 2), ½ gr. (No. 3), 1 gr. (No. 4)
(Warning: may be habit forming)	

Contraindications: Hypersensitivity to any ingredient.

Precautions: As with all phenacetin-containing products, avoid excessive or prolonged use.

Side Effects: Side effects are uncommon—nausea, constipation, and drowsiness have been reported.

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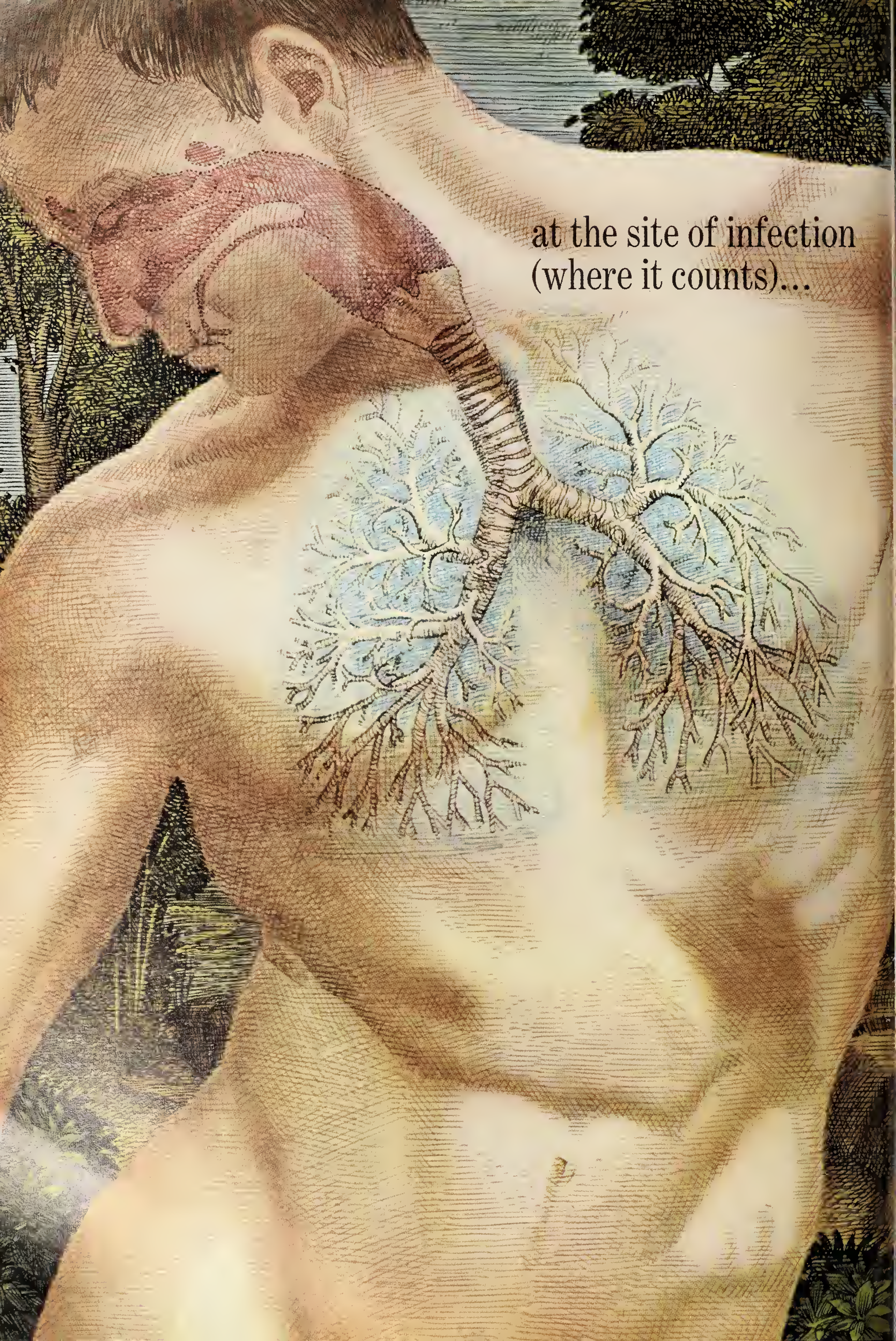
at the site of infection
(where it counts)...

Ilosone® provides more antibacterial activity than any other oral erythromycin

Acid stable, better absorbed... Ilosone produces faster, higher, more prolonged blood levels, even in the presence of food[1-3]

Because it is the most active form of oral erythromycin, Ilosone can help assure consistently greater antibacterial activity at the site of infection. Ilosone produces peak antibacterial blood levels two to four times those of other erythromycin preparations.[1,2] Not only are these levels attained earlier, but they are maintained for much longer periods. Even the presence of food does not seem to affect the activity of Ilosone.[1,3]

In the treatment of patients with bacterial infections susceptible to erythromycin, Ilosone has compiled an excellent therapeutic record. Since it exerts its greatest activity against gram-positive organisms, it is particularly useful in common respiratory and soft-tissue bacterial infections. Ilosone kills—not merely inhibits—streptococci, pneumococci, and more strains of staphylococci than any other macrolide antibiotic. This bactericidal action, coupled with the high antibacterial levels attained, makes Ilosone especially valuable in patients with low host resistance, such as infants, debilitated individuals, and diabetics.

Ilosone has shown no cross-resistance with penicillin and may be effective against organisms that have become resistant to that agent. Despite its high antibacterial activity, Ilosone has demonstrated a low incidence of side reactions. Blood dyscrasias, ototoxicity, and tooth staining have not been observed. Infrequent cases of drug idiosyncrasy, manifested by a cholestatic jaundice, have occurred, but there have been no known definite residual effects.

700121

Ilosone®
Erythromycin Estolate

Lilly

(See next page for prescribing information.)

Ilosone®/the most active oral form of erythromycin

Description: Ilosone is the most active form of oral erythromycin that has been developed. Because it is stable in acid, well absorbed, and excreted in lesser amounts in the bile, it provides faster, higher, and longer-lasting levels of antibacterial activity (ABA) in the serum, even when taken with food, than do comparable doses of erythromycin.

Indications: Ilosone is indicated in infections caused by microorganisms sensitive to its action (especially staphylococci, hemolytic streptococci, and pneumococci). The drug is therefore useful in a high proportion of bacterial diseases encountered in clinical practice and particularly in the treatment of bacterial infections of the upper and lower respiratory tract and soft tissues.

In the treatment of acute bacterial pharyngitis and tonsillitis, this antibiotic has promptly eradicated the bacteria (streptococci) and has produced a parallel prompt clinical improvement. There have been no group A beta-hemolytic streptococci resistant to this preparation. In beta-hemolytic streptococcus infections, treatment should be maintained for ten days to prevent the development of rheumatic fever or glomerulonephritis.

Erythromycin estolate has proved to be very effective in pneumococcus pneumonia and in acute bronchitis with pneumococci on culture. Bronchopneumonia and otitis media in children have responded well to its use.

The antibiotic has been used very successfully in staphylococcus infections. Good therapeutic results have been obtained in soft-tissue infections, abscesses, cellulitis, carbuncles, wound infections, and furunculosis.

In serious staphylococcus infections, erythromycin preparations should be used only in combination therapy with other antimicrobial agents. As is the case with any treatment regimen used in these severe conditions, surgical procedures should be performed when indicated, and large dosages of the antimicrobial agents should be employed. In this fashion, Ilosone has been effective in staphylococcus pneumonia, osteomyelitis, septicemia, empyema, and meningitis.

Multiple 500-mg. doses of the drug have been useful in gonorrhea and syphilis. Since penicillin is the drug of choice for the treatment of syphilis and gonorrhea, erythromycin estolate should be employed for these infections only in patients with a history of penicillin allergy. Also, other infections due to susceptible bacteria in patients known to be hypersensitive to penicillin or other antibiotics may be considered for treatment with Ilosone.

Contraindications: Ilosone is contraindicated in patients with a known history of sensitivity to this drug and in those with preexisting liver disease or dysfunction.

Side-Effects: Data obtained from seven years' use of propionyl erythromycin ester and erythromycin estolate (Ilosone) indicate that hepatic dysfunction with or without clinical jaundice may occur during or following courses of therapy with the drug.

Changes in liver function tests in such cases have been indicative of intrahepatic cholestasis. The symptoms appear to be the result of a form of sensitization. The initial symptoms have appeared in some cases after a few days of treatment but generally have followed one or two weeks of continuous therapy or several courses of the drug. Symptoms reappear promptly if the drug is readministered to sensitive patients, usually within forty-eight hours. Eosinophilia was noted in peripheral blood counts. The findings readily subsided without apparent residual effects when treatment was discontinued. Recovery was delayed in one reported instance. The physician indicated in this case that either drug-induced jaundice or viral hepatitis may have been responsible for the findings.

In one clinical study involving ninety-three patients treated with the antibiotic, three cases of jaundice were observed and an additional eleven cases developed some changes in liver function tests. Three of the patients had abnormal liver function tests a second time on readministration of the drug.

Even though it is assumed that not all cases of jaundice have been reported, it seems clear that the number is small compared with the amount of drug that has been used. Reported cases have included persons in whom there had been administered other drugs known to be associated at times with hepatic side-effects and cases in which the presence of viral hepatitis or other disease may have been responsible for the findings. In some of the cases, associated gastro-intestinal symptoms simulated the colic of biliary tract disease. In other instances, clinical symptoms and results of liver function tests resembled findings in extrahepatic obstructive jaundice. It appears that the occurrence of jaundice after administration of Ilosone is infrequent, but further investigations are being made to estimate its incidence more accurately.

In those cases mentioned above in which jaundice appeared to be definitely related to use of the drug, laboratory findings wei characterized by increased direct-reacting bilirubin, elevate alkaline phosphatase levels, negative or weakly positive cephali flocculation and thymol turbidity tests, elevated serum glutami oxalacetic transaminase levels, peripheral eosinophilia, and noı mal cholecystograms.

Individual idiosyncrasy seems evident since jaundice has nı been reported in other patients taking prolonged courses of th medication. Patients with chronic infection have been given 1 t to 2 Gm. of the drug daily for periods of two to six months, an patients with rheumatic fever have taken prophylactic doses c 0.5 Gm. daily for two years without difficulty. In one group c 144 patients who received the drug daily for two years, no jaur dice was noted. It was of interest that members of six of thes patients' families, who were not taking the drug, had episode of jaundice during the study period.

Transaminase and serum alkaline phosphatase levels wer determined in a group of fifty-four adults and children who too 250 mg. of Ilosone daily for an average of sixteen months a rheumatic fever prophylaxis. The results were compared wit those of a similar group of forty-four patients who received per icillin. There were no cases of jaundice in either group. Elevatio of SGPT and serum alkaline phosphatase levels during the cours of treatment was observed in one patient treated with Iloson and in two patients treated with penicillin. Seven other patient in the group receiving Ilosone and four others in the penicilli group showed elevations in one of the tests at some time durin administration of the drugs.

Very satisfactory therapeutic results, without toxicity, wer reported in 102 pediatric patients who received short-term (ten day) courses of Ilosone in the treatment of streptococcus infec tions. Results of liver function tests in these patients were com parable to those in a similar control group who had receive penicillin.

Gastro-intestinal disturbances not associated with hepatic ef fects are observed in a small proportion of individuals as a resul of a local stimulating effect of the medication on the alimentar tract; however, the normal intestinal gram-negative bacteria flora is not appreciably altered by erythromycin drugs.

Although allergic manifestations are uncommon with the us of erythromycin, there have been occasional reports of urticaria skin eruptions, and, on rare occasions, anaphylaxis.

Administration and Dosage: Ilosone is administered orally.

Ilosone Pulvules®
Ilosone Chewable Tablets
Ilosone Drops
Ilosone, 125, for Oral Suspension

For infants and for children under twenty-five pounds of bod weight, the usual dosage is 5 mg. per pound every six hours; fo children twenty-five to fifty pounds, 125 mg. every six hours (Tablets Ilosone Chewable should be chewed or crushed an swallowed with water.)

For adults and for children over fifty pounds, the usual dosag of Ilosone is 250 mg. every six hours.

For severe infections, these dosages may be doubled.

When larger doses are indicated, parenteral erythromyci therapy should be considered.

In the treatment of syphilis, the recommended total dosage i 20 to 30 Gm. given in divided doses for a period of ten to fiftee days. Close follow-up of the patient is necessary since erythro mycin drugs have not had adequate evaluation in all stages o syphilis. Examinations of spinal fluid are recommended as par of the follow-up therapy.

For gonorrhea, 500 mg. four times a day for four days ar recommended.' In the treatment of gonorrhea, patients with a suspected lesion of syphilis should have a dark-field examinatioı before receiving antibiotics, and monthly serologic tests shoul be made for a period of three months.

How Supplied: Pulvules Ilosone, Capsules, N.F., 125 and 250 mg (equivalent to base), in bottles of 24 and 100.

Tablets Ilosone Chewable, N.F., 125 mg. (equivalent to base) in bottles of 50.

Ilosone Drops, 5 mg. (equivalent to base) per drop, in 10-cc. size packages, with dropper calibrated at 25 and 50 mg.

Ilosone, 125, for Oral Suspension, N.F., 125 mg. (equivalen to base) per 5-cc. teaspoonful, in 60 and 150-cc.-size packages

References: 1. Griffith, R. S., and Black, H. R.: Am. J. M. Sc., *247:*69, 1964
2. Griffith, R. S., and Black, H. R.: Antibiotics & Chemother., *12:*398, 1962
3. Hirsch, H. A., Pryles, C. V., and Finland, M.: Am. J. M. Sc., *239:*198, 1960.

Additional information available to physicians upon request.
Eli Lilly and Company, Indianapolis, Indiana 46206.

Lilly

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APA Convention Comes to Detroit

MSMS members will be able this year to attend the 123rd Annual Meeting of the American Psychiatric Association — because it will be held at Cobo Hall, Detroit, May 8-12.

The March issue of the *American Journal of Psychiatry* will publish the outline of the Scientific Program. Non-members can obtain a copy of it in advance after April 1 by writing to Public Information Officer, APA Central Office, 1700 Eighteenth Street, N.W., Washington, D.C. 20009.

Registration fee for non-members is $10.00 for the week or $5.00 for a single day. Any further information can be obtained from the Public Information Officer at the above address.

Flint to Host Alcoholism Meeting

Michigan State Medical Society members are invited to attend the Annual Meeting of the National Council on Alcoholism to be held in Flint, April 11-14.

The Flint Committee on Alcoholism will host the meeting. Further information can be obtained from Mrs. Carolyn Henick, Education Director, Information Center, 304 Metropolitan Bldg., Flint, Michigan.

The members of the MSMS Committee on Alcoholism and Narcotics urge interested MSMS members to mark their calendars today for the April event.

DELEGATE HONORED

Recently named to the Board of Trustees of Detroit Adventure is Marjorie Peebles Meyers, M.D., Detroit. Dr. Meyers, a Wayne County Medical Society delegate to the MSMS House of Delegates, represents the International Institute on the Board.

Add: More About Doctors

Many fine comments have been received at the MSMS headquarters from physicians, teachers and others about the new film developed by Frederick J. Margolis, M.D., Kalamazoo, called "Parent to Child about Sex." The 30-minute film, suggested for PTA's, service clubs, teacher-education classes, nurses-training programs, expectant-parent sessions, etc., is available on a rental basis from the Wayne State University Audio-Visual Utilization Center.

The new district chairman of the American Academy of Pediatrics is Robert M. Heavenrich, M.D., chief of pediatrics at Saginaw General Hospital.

T. N. Evans, M.D., was inducted as the new chairman of District V of the American College of Obstetricians and Gynecologists, an area which includes Michigan, Indiana, Kentucky, Ohio and Ontario.

Robert White, M.D., Adrian, reported some of his experiences as a missionary in Africa at a recent meeting of the Lenawee-Hillsdale pharmacy group.

Two MSMS committee chairmen have been authorized by The Council to attend AMA-sponsored conferences. Benjamin Jeffries, M.D., Harper Woods, Chairman of the MSMS Committee on Mental Health, will attend the 13th Annual Conference of State Mental Health Representatives in Chicago, February 24-25.

Radio Promotes Health Careers

Young people in the Kalamazoo area are learning more about the opportunities for careers in medicine as they listen to their favorite disc jockeys over Radio Station WKMI.

The station contacted the Kalamazoo Academy of Medicine for assistance with a series of career announcements and these were taped by V. A. Berglund, M.D., chairman of the Academy's public relations committee.

The station plays the medical-careers announcement—along with others about law, teaching, etc.,—from time to time throughout the day.

Medical History Search Underway

The first meeting of the new MSMS Committee on Michigan Medical History December 7 explored many possible areas of activity.

Chairman J. R. G. Gosling, M.D., Ann Arbor, reports the Committee considered these questions and others:

What are the present Michigan medical historical sites, collections, programs, etc.? What are our responsibilities to them?

What similar uniquely Michigan subjects of historical interest have been neglected?

Do we need a bibliography of Michigan medical history material?

To what degree and by what means it is desirable to stimulate historical interest and research among practitioners, medical students, etc.?

What activities in medical history are suitable for the three medical schools of the state, and to what degree should we involve ourselves in this question?

Posed by professional model

I'm supposed to get up and do things?

With my heart?

It's entirely natural—and may even be desirable—for the cardiovascular patient to be somewhat anxious about himself.

But when anxiety leads to unreasonable self-imposed limitations and restrictions . . . when it aggravates cardiovascular symptoms . . . when it interferes with restful sleep, measures to help alleviate the anxiety are probably in order.

One measure, of course, is reassurance. Another, adjunctive measure, is EQUANIL (meprobamate).

Over a decade of experience has shown that EQUANIL (meprobamate) is generally well tolerated as well as effective. Side effects are usually limited to transient drowsiness; serious, therapy-interrupting side effects are rare.

Cautions: Carefully supervise dose and amounts prescribed, especially for patients prone to overdose themselves. Excessive prolonged use may result in dependence or habituation in susceptible persons—as ex-addicts, alcoholics, severe psychoneurotics. After prolonged high dosage, drug should be withdrawn gradually to avoid possibly severe withdrawal reactions including epileptiform seizures. Side effects include drowsiness and, rarely, allergic or idiosyncratic reactions. These reactions, sometimes severe, can develop in patients receiving only 1 to 4 doses who have had no previous contact with meprobamate. Mild reactions are characterized by urticarial or erythematous maculopapular rash. Acute non-thrombocytopenic purpura with petechiae, ecchymoses, peripheral edema and fever have been reported. Meprobamate should be stopped and not reinstituted. Severe reactions, observed very rarely, include angioneurotic edema, bronchial spasms, fever, fainting spells, hypotensive crises (1 fatal case), anaphylaxis, stomatitis and proctitis (1 case) and hyperthermia. Warn patients of possible reduced alcohol tolerance. Should drowsiness, ataxia, or visual disturbances occur, dose should be reduced. If symptoms persist, patients should not operate vehicles or dangerous machinery. A few cases of leukopenia, usually transient, have been reported following prolonged dosage. Other blood dyscrasias—aplastic anemia (1 fatal case), thrombocytopenic purpura, agranulocytosis and hemolytic anemia—have occurred rarely, almost always in the presence of known toxic agents. One fatal case of bullous dermatitis following intermittent use of meprobamate with prednisolone has been reported. Prescribe very cautiously for patients with suicidal tendencies. Suicidal attempts should be treated with immediate gastric lavage and appropriate supportive therapy.

Contraindications: History of sensitivity to meprobamate.

Composition: Tablets, 200 mg. and 400 mg. meprobamate. Coated Tablets, WYSEALS® EQUANIL (meprobamate) 400 mg. Continuous-Release Capsules, EQUANIL L-A (meprobamate) 400 mg.

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SERVICE TO MEDICINE

Extract of MSMS Council Minutes, January 25

The Council approved the holding of regional meetings throughout the state with officers of component medical societies, in lieu of the annual Officers Conference, formerly known as the County Secretaries-Public Relations Seminar. A major informational meeting with officers of component medical societies and possibly delegates is planned for June.

The Council authorized employment for a six-month period of a special assistant for legislation and liaison. The terms of the contract will be subject to review at the end of that period.

The Council authorized a representative to attend: 1) the AMA Committee on Medical Aspects of Automotive Safety, 2) the AMA National Congress on Environmental Health Management, 3) the U.S. Chamber of Commerce one-day regional meeting, and 4) the 63rd Annual Congress on Medical Education.

The Council received a report on a meeting between representatives of the Michigan Welfare League and MSMS and authorized the Council Chairman to appoint three members of The Council to meet with three members of the Welfare League to explore future liaison between the two organizations.

Upon recommendation of the Finance Committee, The Council authorized that MSMS become a sustaining member of the Student American Medical Association at an annual cost of $100.

Upon recommendation of the Publication Committee, The Council authorized an increase in advertising rates for *Michigan Medicine.*

EAST LANSING
MICHIGAN

The Committee on Michigan Medical History was authorized to request component medical societies to appoint a medical history chairman and/or committee.

The Council approved a covering letter to go with the Michigan Relative Value Study which is being mailed to MSMS members as authorized by the House of Delegates.

Michigan State University Dean Andrew Hunt, MD, reported to The Council that the State Board of Education had acted today to authorize expansion of MSU to a four-year medical school and also to provide for the expansion of Wayne State University and University of Michigan Medical Schools.

The Council appointed a committee to develop an MSMS policy re screening examinations.

A nomination was submitted to Governor Romney for appointment to the Michigan Consumer Council.

A letter from the American Cancer Society, Michigan Division, Professional Information Committee, requesting opinion or guidelines from The Council regarding the inclusion of osteopaths in ACS educational programs was referred to the MSMS Committee on Medicine and Osteopathy and the Committee on Cancer for development of a written policy statement.

The Council received a report on the results of a visit to California by Michigan legislators to study the MD-DO merger in that state.

The Council requested the Governmental Medical Care Programs Committee to review 1966 House of Delegates Resolution 15 and to clarify and interpret for The Council what sort of questions might conceivably arise, that are properly the concern of Blue Shield, which logically could be referred to a county medical society committee.

For information, The Council received a report of a laision meeting between MSMS representatives and Michigan representatives of the National Medical Association.

Resolutions from the Genesee County Medical Society and the Jackson County Medical Society were received by The Council. These resolutions requested action to reconsider the Hospital Utilization Review Manual.

This being the Annual Meeting of The Council, the following elections and appointments were made: Secretary—Oliver B. McGillicuddy, MD, Lansing; Treasurer—John R. Ylvisaker, MD, Pontiac; Scientific Editor—George H. Lowrey, MD, Ann Arbor; Executive Director—Hugh W. Brenneman, East Lansing; Associate Executive Director—Warren F. Tryloff.

what time is it?

For the past
two years
there's been
one new case
of active tuberculosis
reported for every
four thousand
of U.S. population.

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Tuberculin, Tine Test

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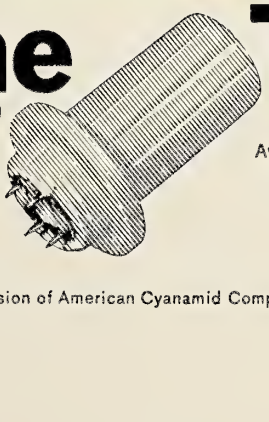

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Careers Mobile Rolls With New Exhibits

Many new exhibits will be on display in the Michigan Health Council's Health Careers Mobile which began its tour of career recruitment February 20 in Jackson.

Of special interest is an actual heart-lung machine with accompanying photographs illustrating its use in surgery. The heart-lung machine is a part of the University of Michigan's new exhibit.

Wayne State University's exhibit features the school's many educational opportunities for persons training for health careers.

A highlight of Jackson's Health Career Week, February 20-26, the Careers Mobile was also to be a part of Mercy Hospital's Open House for young people interested in health careers.

The Careers Mobile, formerly the MSMS Healthmobile, has an attractive, new exterior focusing on career recruitment. Of special interest is a large picture on the exterior of *Horizons Unlimited,* the AMA's book on health careers. The Mobile continues to dispense these books and other career recruitment materials as the Healthmobile did in the past.

Owing to the widespread interest in the MSMS Healthmobile and the anticipated results of the Careers Mobile, Milford O. Rouse, M.D., President-Elect of the American Medical Association, has asked that the unit be brought to the AMA Annual Convention, June 18-22, in Atlantic City, New Jersey. The AMA reportedly is considering the possibility of acquiring five similar units for use in career recruitment.

MSU Course Considers Five-Meals-A-Day

The five-meal-a-day hospital routine, its advantages and its problems, were examined by hospital food service people from seven states and Canada at Michigan State University's current 10-week course for hospital food service supervisors.

The five-meal-a-day routine has the advantage of requiring only one shift of hospital food service personnel, according to Miss Myrtle Van Horne, coordinator of the training course. But it does create a problem in assuring adequate choice and intake of fruits and vegetables, she allowed.

The MSU course was sponsored by the American Hospital and Dietetic Associations.

An interview for The Detroit News provided one of the lighter moments at the Sixth Annual Thyroid Workshop sponsored by the Wayne State University School of Medicine and Detroit General Hospital. Taking part, from left, were: Jean Pearson, news science writer; Richard J. Bing, M.D., Professor and Chairman of Internal Medicine at WSU; Roger Greif, M.D., Professor of Physiology at Cornell University Medical College, who delivered the Merck, Sharpe and Dohme Lecture; and Nelson Taylor, M.D., Associate Professor of Internal Medicine at WSU and general chairman of the Workshop. The program was held at Wayne County Medical Society headquarters.

U-M Offers Symposium On Highway Injuries

Outstanding medical authorities from Michigan, Illinois, California, Indiana, Ontario, and Washington, D.C., will speak at the three-day University of Michigan Sesquicentennial Symposium on the Prevention of Highway Injury, April 19-21.

Among the featured speakers will be Julian Waller, M.D., California, on "Drinking Drivers and Driving Drinkers — The Need for Multiple Approaches to Accidents Involving Alcohol;" W. D. Wright, M.D., London, "Visibility in Night Driving;" Richard G. Snyder, M.D., Dearborn, "Seat Belt Injuries on Impact." A complete program is available from the Conference Department, Extension Service, University of Michigan, 412 Maynard Street, Ann Arbor 48104.

Cosponsoring the event are the U-M Medical School and its Highway Safety Research Institute, with Melvin Selser, M.D., as chairman of the planning committee.

TRUE, TRUE

The following is an excerpt from the annual report of the New York Opticians Association: "Nowadays men do make passes at girls who wear glasses, although we have to admit a lot still depends on their frames."

TAYLOR TO GIVE FOSTER LECTURE TO MSMAS

JACKSON . . . The Michigan State Medical Assistants Society announces that Ross V. Taylor, M.D., of Jackson, will give the L. Fernard Foster Lecture at the Medical Assistants Annual Educational Seminar, April 23 in Jackson. Other speakers at the meeting, to be held at the Hayes Motor Hotel, will be Donald Huldin, M.D., of Jackson, on "Dermadromes," and John R. Gosling, M.D., from Ann Arbor, on "Gynecological Bleeding."

The Annual Meeting for the Medical Assistants will be held September 27 and 28 in Grand Rapids at the Mr. President Motor Inn.

The MSMAS Board of Directors moved along the plans for these two major events at its board meeting, January 22 at the MSMS Headquarters.

RADIOLOGISTS TO HONOR LEUCUTIA

LOS ANGELES . . . Traian Leucutia, M.D., Detroit, will receive the Gold Medal of the American College of Radiology, February 2 in Los Angeles at the annual meeting.

MSMS in 1965 presented a Certificate of Commendation for his "distinguished career as a radiologist at Harper Hospital and as past president of the Michigan and National Roentgen Ray Societies and as editor of his national specialty journal."

Jackson E. Livesay, M.D., Flint, is president now of the American College of Radiology.

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"The caliber of the job you do that will determine how well your papers will compete against other media for audience time and attention."

So stated Thomas B. Adams, president of Campbell-Ewald Company, before an audience of 300 newspapermen at the 99th Annual Convention of the Michigan Press Association in East Lansing.

Mr. Adams also declared, "It's becoming increasingly vital that you all do a more and more effective job of covering local social, civic and business news, promote the new high school, the new street and sewage system, take an aggressive role in cleaning up the city government and give direction to other local projects which you all know how to do so well."

BOOKS RECEIVED

Egg Implantation (Ciba Foundation Study Group No. 23). Edited by G. E. W. Wolstenholme and Maeve O'Connor. 112 pp., illustrated. $3.50. Little, Brown and Company, Boston, 1966.

Histones, Their Role in the Transfer of Genetic Information (Ciba Foundation Study Group No. 24). Edited by A. V. S. deReuck and Julie Knight. 115 pp, illustrated. $3.50. Little, Brown and Company, Boston, 1966.

Touch, Heat and Pain (Ciba Foundation Symposium). Edited by A. V. deReuck and Julie Knight. 389 pp, illustrated. $14.00. Little, Brown and Company, Boston, 1966.

The Thymus: Experimental and Clinical Studies (Ciba Foundation Symposium). Edited by G.E.W. Wolstenholme and Ruth Porter. 538 pp, illustrated. $15.00. Little, Brown and Company, Boston, 1966.

Selected Papers of Peter A. Martin, M.D. For further information contact Dr. Martin.

mediscene

Mar. 8 – The Council, MSMS Headquarters, East Lansing

Mar. 15-16 – Annual Michigan Conference on Maternal and Perinatal Welfare, Pick-Durant Hotel, Flint

Mar. 18 – Visting Lecture, Professor Jules H. Masserman, "The Fundamentals of Therapy: The Time-Tested-Triad," Activity Therapy Auditorium, Northville State Hospital

Apr. 3 – Beaumont Lecture, Wayne County Medical Society Building, Detroit

Apr. 4 – Annual Membership Conference, Michigan League for Nursing, Kellogg Center, Michigan State University, East Lansing

Apr. 11-14 – Annual Meeting, National Council of Alcoholism, Flint

Apr. 19 – The Council, MSMS Headquarters, East Lansing

Apr. 26 – Muskegon Trauma Day, Muskegon

May 1-3 – The Initial Management of the Acutely Injured Conference, Rackham Lecture Hall, the University of Michigan, Ann Arbor

May 7-12 – American Psychiatric Association, Cobo Hall, Detroit

May 17 – Annual Wayne State University Medical School Alumni Day, Detroit

May 17 – Muscle Symposium, Wayne County Medical Society Building, Detroit

May 17-19 – Michigan Public Health Association Conference, Pantlind Hotel, Grand Rapids

May 31 – The Council, MSMS Headquarters, East Lansing

June 8-10 – 74th Annual Meeting of Michigan Upper Peninsula Medical Society, Escanaba

June 18-22 – 1967 AMA Annual Convention, Atlantic City, New Jersey

June 18 – Annual Convention of the Woman's Auxiliary to the American Medical Association, Atlantic City, New Jersey

July 13-15 – The Council, Grand Hotel, Mackinac Island

Aug. 25 – The Council, MSMS Headquarters, East Lansing

Sept. 24-26 – MSMS House of Delegates, Pantlind Hotel, Grand Rapids

Sept. 26-27 – MSMS Woman's Auxiliary, Pantlind Hotel, Grand Rapids

Sept. 27 – MSMS Dinner Dance, Pantlind Hotel, Grand Rapids

Sept. 27-29 – MSMS Annual Scientific Session, Civic Auditorium, Grand Rapids

Sept. 27-28 – Michigan State Medical Assistants Society Convention, Mr. President Motel, Grand Rapids

Oct. 15-21 – Community Health Week

Nov. 2 – Southwestern Michigan Clinic Day

Nov. 8 – The Council, MSMS Headquarters, East Lansing

Nov. 9-10 – Arthritis Symposium, University of Michigan Medical School, Ann Arbor

Nov. 26-29 – AMA Clinical Convention, Houston

Dec. 13 – The Council, MSMS Headquarters, East Lansing

IT'S AS PLAIN
AS THE
NOSE ON HIS
FACE.

UP TO 10–12 HOURS' CLEAR BREATHING ON ONE TABLET

Dimetapp® Extentabs®

(Dimetane® [brompheniramine maleate], 12 mg.; phenylephrine HCl, 15 mg.; phenylpropanolamine HCl, 15 mg.)

In sinusitis, colds, or U.R.I., Dimetapp lets congested patients breathe easy again. Each Extentab brings welcome relief all day or all night, usually without drowsiness or overstimulation. Its key to success? The Dimetapp formula—Dimetane (brompheniramine maleate), a potent antihistamine reported in one study to have elicited side effects as few as the placebo,* teamed with decongestants phenylephrine and phenylpropanolamine—in a dependable 10- to 12-hour form.

Contraindications: Patients hypersensitive to antihistamines. Not recommended for use during pregnancy.

Precautions: Until the patient's response has been determined, he should be cautioned against engaging in operations requiring alertness. Administer with care to patients with cardiac or peripheral vascular diseases or hypertension.

Side Effects: Hypersensitivity reactions including skin rashes, urticaria, hypotension and thrombocytopenia have been reported on rare occasions. Drowsiness, lassitude, nausea, giddiness, dryness of the mouth, mydriasis, increased irritability or excitement may be encountered.

Dosage: 1 Extentab morning and evening, or as needed.

Supplied: Bottles of 100 and 500.

Also available: Dimetapp® Elixir for conventional *t.i.d.* or *q.i.d.* dosage. See package insert for further details.

A. H. ROBINS CO., INC.
RICHMOND, VIRGINIA 23220
A-H-ROBINS

*Schiller, I. W., and Lowell, F. C.: New England J. Med. 261:478, 1959.

℞

Don't delegate your authority in the choice of drugs

Generic prescribing allows a third party to choose for you. This does not of necessity ensure therapeutic effectiveness or lowest patient cost.

You can prescribe the quality and purity of ACHROMYCIN® V Tetracycline-Lederle at a cost that is within pennies-a-day of the low-priced generic tetracycline.

When you prescribe tetracycline, write ACHROMYCIN V. It's good policy, good medicine and good economy, all in one prescription. LEDERLE LABORATORIES, A Division of American Cyanamid Company, Pearl River, New York.

MAJOR PRICE REDUCTION JAN. 15, 1967

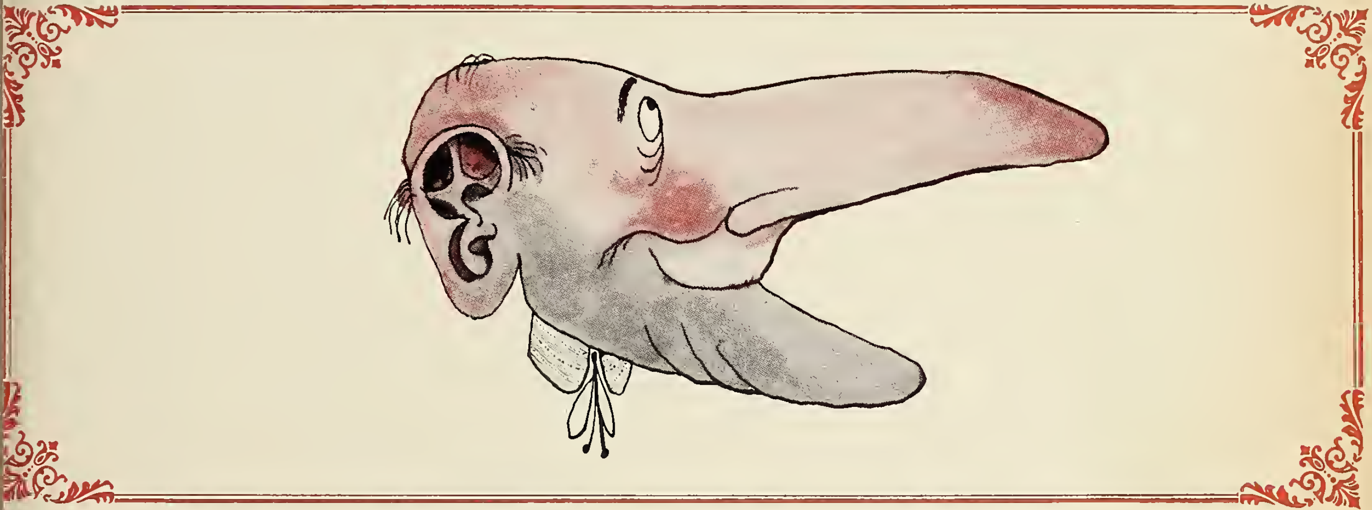
ACHROMYCIN® V
TETRACYCLINE-LEDERLE

Lederle

The Proof of Excellence is in the Performance

for noses of every description,
one safe and sure prescription:

Otrivin®
(xylometazoline CIBA)
on Rx only



- **quickly relieves congested nose**
- **action is gentle, yet prolonged**
- **side effects are minimal**

INDICATION: Nasal congestion. CONTRAINDICATION: Do not use in patients sensitive to small doses of sympathomimetic substances. WARNINGS: Prolonged or excessive use may cause rebound congestion. Use cautiously in patients with hyperthyroidism, coronary artery disease, hypertension, and diabetes. CAUTION: Do not shake Nasal Spray. Rinse Nasal Solution dropper or Nasal Spray tip in hot water after each use. No more than one person should use the same dropper bottle or nasal spray.

SIDE EFFECTS: Occasional local reactions: rebound congestion, slight burning or stinging, sneezing, dry nose. Occasional systemic effects: headache, drowsiness, lightheadedness, insomnia, palpitations. Overdosage in young children may produce profound sedation. DOSAGE: **Adults:** *Nasal Solution*—2 or 3 drops in each nostril every 4 to 6 hours. *Nasal Spray*—Squeeze rapidly once or twice in each nostril every 4 to 6 hours. **Children under 12:** *Pediatric Nasal Solution*—2 or 3 drops in each nostril every 4 to 6 hours. One drop should be used in infants under 6 months. *Pediatric Nasal Spray*—Squeeze rapidly once in each nostril holding tube upright; repeat every 4 hours as necessary. SUPPLIED: OTRIVIN® hydrochloride (xylometazoline hydrochloride CIBA) *Nasal Solution*, 0.1%; dropper bottles of 1 fluidounce, bottles of 1 pint. *Nasal Spray*, 0.1%; plastic squeeze tubes of 15 ml. *Pediatric Nasal Solution*, 0.05%; dropper bottles of 1 fluidounce. *Pediatric Nasal Spray*, 0.05%; plastic squeeze tubes of 15 ml. *Nasal Solutions* contain either 0.1% or 0.05% xylometazoline hydrochloride, triethanolamine, hydrochloric acid, sodium chloride, and phenylmercuric acetate 1:50,000 as preservative in water. *Nasal Sprays* contain either 0.1% or 0.05% xylometazoline hydrochloride, potassium phosphate monobasic, potassium chloride, sodium phosphate dibasic, sodium chloride, and benzalkonium chloride 1:5000 as preservative in water. *Consult complete literature before prescribing.*

CIBA Pharmaceutical Company, Summit, N. J.

CIBA

2/3329 MKL-1

Do your patients
shell out too much
for a diuretic?

The answer may be yes... if they're not on Hygroton. For instance, a therapeutic dose of a short-acting diuretic may cost 3 times as much as an equivalent dose of Hygroton. With Hygroton, in fact, you can usually do the job with just one tablet a day or one every other day. It's no wonder that the trend has been away from short-acting, multiple-dose, high-cost diuretics.

You may hear that a short-acting diuretic was more effective in a 400 mg. (ten-tablet) dose than Hygroton in a 200 mg. (two-tablet) dose. If one considers maximum recommended doses for each product, tablet for tablet Hygroton was clearly superior. Two tablets of Hygroton were found to produce almost 40% more natruresis and 20% more weight loss than five tablets of the other diuretic.* Note that these are maximum recommended doses!

For effectiveness, economy, and convenience, therefore, Hygroton is the diuretic to choose to start with and the one to stay with.

*Brest, A. N., et al.: J. New Drugs 5:329, 1965.

Natruresis above control values after maximum recommended doses (mEq./24 hours) in "normal" patients

111 5 tablets short-acting nonthiazide diuretic	152 2 tablets Hygroton

48-hour weight loss after maximum recommended doses in edematous patients with congestive heart failure due to arteriosclerotic or rheumatic heart disease

1.84 lbs. 5 tablets short-acting nonthiazide diuretic	2.2 lbs. 2 tablets Hygroton

Indications: Hypertension and many types of edema involving retention of salt and water.
Contraindications: Hypersensitivity and most cases of severe renal or hepatic disease.
Warning: With administration of enteric-coated potassium supplements, the possibility of small bowel lesions should be kept in mind.
Precautions: Reduce dosage of concomitant antihypertensive agents by at least one-half. Discontinue if the BUN rises or liver dysfunction is aggravated. Electrolyte imbalance and potassium depletion may occur; take special care in cirrhosis or severe ischemic heart disease, and in patients receiving corticosteroids, ACTH, or digitalis. Salt restriction is not recommended.
Side Effects: Dizziness, weakness, nausea, vomiting, hyperglycemia, hyperuricemia, headache, muscle cramps, postural hypotension, constipation, leukopenia, thrombocytopenia, agranulocytosis, impotence, dysuria, transient myopia, skin reactions, including urticaria and purpura, epigastric pain, or G.I. symptoms after prolonged administration.
Average Dosage: One tablet (100 mg.) with breakfast daily or every other day.
Availability: Tablets of 100 mg. in bottles of 100 and 1000.
For full details, see the complete prescribing information.
6524-V(B)

HY-4736S

Hygroton®
chlorthalidone

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Michigan Foundation Reelects; To Study New, Broader Role

All officers and the members of the Board of Trustees of the Michigan Foundation for Medical and Health Education have been reelected for 1967. Included are: President E. I. Carr, M.D., Lansing; Vice President Harry A. Towsley, M.D., Ann Arbor; Secretary Warren F. Tryloff, MSMS Associate Executive Director; and Treasurer Herbert Gardner, Birmingham.

Newly-elected to the Board of Trustees at the recent annual meeting to fill vacancies on the Board are Doctor Towsley and B. James Theodoroff, Detroit.

Reelected to the Board are: Doctor Carr; T. N. Evans, M.D.; H. H. Gardner; G. T. McKean, M.D.; G. B. Saltonstall, M.D.; John M. Sheldon, M.D.; and J. F. Wolfram.

Doctor Towsley, acting in President Carr's behalf, states in the President's Report that in the coming year the Board of Trustees has agreed to "1) study the broadening of the Foundation's activities, 2) enlarge its role in the granting of scholarships or fellowships to medical students, 3) reduce its interest in providing loans, and 4) explore methods of increasing the amount of Foundation funds through encouragement of individual and organizational contributions and/or bequests."

This year, Doctor Towsley reports, the Foundation will continue distributing grants to outstanding medical students at the two Michigan medical schools and providing two grants annually to practicing physicians to attend the Rutgers Summer School of Alcohol Studies.

Hiscoe Represents MSMS At Regional Medical Programs Conference

Representing the Michigan State Medical Society at the recent Conference on Regional Medical Programs held in Washington, D.C., was D. Bonta Hiscoe, M.D., Lansing.

Doctor Hiscoe, the alternate MSMS delegate to the Michigan Association of Regional Medical Programs, attended in place of delegate Don Marshall, M.D., Kalamazoo, who was unable to go.

SHORT TRIP FOR WRITERS

Michigan members of the American Medical Writers Association will have a short trip this fall to attend their 1967 annual meeting at the Palmer House, Chicago, Sept. 21-24.

For details write to James E. Bryan, Executive Secretary, 2000 P St., N.W., Washington, D.C. 20036.

This meeting was held in Detroit in 1965 in connection with the MSMS Centennial.

new members

Adolfo J. Brane, M.D., Lafayette Clinic, Detroit 48207

John G. Calwell, M.D., 714 New Center Building, Detroit 48202

Robert R. Canas, M.D., G-3401 Miller Road, Flint

Mary E. Cantrell, M.D., Henry Ford Hospital, Detroit 48202

Robert C. Dickenman, M.D., Detroit Memorial Hospital, Detroit 48226

John T. Domjancic, M.D., Outer Drive Hospital, Lincoln Park

John J. Hanlon, M.D., 316 City-County Building, Detroit 48226

Sheldon M. Kantor, M.D., 19207 Schaefer, Detroit 48235

Leighton N. L. Kong, M.D., Grace Hospital, Detroit 48201

Rodolfo V. Loo, M.D., Grace Hospital, Detroit 48201

Roscoe I. McFadden, M.D., Bloomingdale

Fazlolah A. Nickhah, M.D., 740 South Emerick Street, Ypsilanti

Arthur Rose, M.D., 1800 Tuxedo, Detroit 48206

Emilio Rusciano, M.D., Grace Hospital, Detroit 48201

Isobel Rutherford, M.D., Detroit Memorial Hospital, Detroit 48226

Alan C. Scheer, M.D., Detroit Memorial Hospital, Detroit 48226

William G. Sills, M.D., 19321 Greenfield, Detroit 48235

Otto P. Soltes, M.D., 17000 West Eight Mile Road, Southfield

Vernon D. Vaandrager, M.D., 245 State Street, S.E., Grand Rapids 49502

In peptic ulcer... antacid therapy with a new benefit

CONTAINS A BALANCED COMBINATION OF THE MOST WIDELY USED ANTACIDS— FOR RAPID NEUTRALIZATION. PLUS SIMETHICONE— TO CONTROL THE FACTOR WHICH ANTACIDS ALONE CANNOT INFLUENCE.

Mylanta®

- In Mylanta, aluminum and magnesium hydroxides are balanced to minimize the chance of constipation or laxation and still achieve rapid acid neutralization and pain relief.
- The positive action of simethicone helps relieve the painful gas symptoms which often accompany the peptic ulcer syndrome.
- The nonfatiguing flavor and smooth, nongritty consistency of tablets and liquid encourage continued patient cooperation during long-term therapy.

Composition: Each Mylanta chewable tablet or teaspoonful (5 ml.) of liquid contains: magnesium hydroxide, 200 mg.; aluminum hydroxide, dried gel, 200 mg.; simethicone, 20 mg. **Dosage:** one or two tablets, well chewed or allowed to dissolve in the mouth, or one or two teaspoonfuls of liquid to be taken between meals and at bedtime.

The Stuart Company, Pasadena, California
Division of Atlas Chemical Industries, Inc.

Stuart

MAP Congress, April 28-29 to Consider "Supervision, Security and Survival"

"Professional Supervision, Security and Survival" is the theme of the 8th Annual Congress of the Professions to be held at Detroit's Statler-Hilton Hotel, April 28-29.

MAP Vice President G. B. Saltonstall, M.D., Charlevoix, points out that "Supervision" refers to the question of whether the professions can discipline themselves. Who should supervise the professions is another aspect of this topic.

"Security," Doctor Saltonstall says, "will bring a review of the question 'Which can serve the professions best insofar as financial reward is concerned — a union or an association.' "

Focusing on the topic "Survival" will be the question of a future "professional" as a group of technicians controlled by a non-professional or a professional man heading a team of assistants.

Doctor Saltonstall urges physicians to make plans now to attend this thought-provoking meeting.

William J. Jones, M.D., Allen Park, is a member of the Congress planning committee.

Proud Moments . . .

"A notable event in the Society's history was the election to membership of Dr. William Beaumont, of Mackinac on June 14, 1825. On August 27, 1826, he gave the Society a report of his celebrated case of gastric fistula, with an account of clinical and chemical studies on gastric digestion, scientific observation, which formed an epoch in our knowledge of human digestion."

That quotation about a highlight in MSMS history is taken from *"A Century of Service in Medicine — A History of the Michigan State Medical Society"* by Wm. J. Stapleton, Jr., M.D., Detroit, the MSMS Historian.

Copies of the handsome book may be obtained from the Michigan State Medical Society, 120 West Saginaw, East Lansing, Michigan 48823, for $2.00 each.

MSMS Alcoholism Educational Efforts Continues

As a part of the current MSMS educational program on alcoholism, Aloysius S. Church, M.D., Detroit, spoke at the Southgate Kiwanis Club on "Conversation with a Psychiatrist about Alcoholism."

Doctor Church is a member of the Michigan State Board of Alcoholism, the board of directors of the National Council on Alcoholism, the World Health Organization's Council on Alcohol and Alcoholism, and the MSMS Alcoholism and Drug Addiction Committee.

ACP Offers Regional PG Course in Michigan

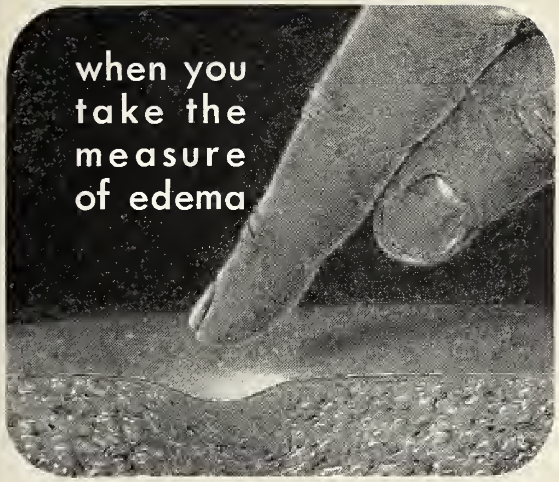
The American College of Physicians (ACP) will sponsor a five-day postgraduate course March 20-24 on "Fundamental Concepts of Gastroenterology" at the University of Michigan Medical School.

The ACP course has been designed to help keep practicing internists abreast of new knowledge in the biochemical and physiologic causes of diseases of the stomach and intestinal tract.

"CRIBBAGE ANYONE?"

"Hand out playing cards in the hospital waiting rooms" is a patient's suggestion to improve the service at the University of Michigan Medical Center.

Patients' advice for bettering the building and operation of the hospital is solicited through a questionnaire distributed as a project to improve hospital service.



. . . introduce your patient to

AQUATAG®
(BENZTHIAZIDE)

AQUATAG (Benzthiazide) is a potent, orally active, nonmercurial, diuretic agent. It is effective orally in producing diuresis in edema states, where it is therapeutically comparable to mercurials given parenterally. AQUATAG (Benzthiazide) is mildly antihypertensive in its own right and enhances the action of other antihypertensive drugs when used in combination.

DIURETIC ACTION: Clinically, the oral administration of AQUATAG (benzthiazide) results in diuretic activity within two hours with maximal natriuretic, chloruretic, and diuretic effects occurring during the fourth, fifth and sixth hours. Maintenance of response continues for approximately 12 to 18 hours. Acidosis is an unlikely complication since therapeutic doses of AQUATAG (benzthiazide) do not appreciably increase bicarbonate excretion. Edematous patients receiving 50 mg. of AQUATAG (benzthiazide) daily for five days developed a maximal increase in the rate of sodium excretion on the first day, and maintained this high rate until depletion of excessive body stores of sodium.

In congestive heart-failure patients, AQUATAG (benzthiazide) produced the same weight loss, during a 48-hour treatment period as did a maximally effective dose of hydrochlorothiazide.

DOSAGE: Diuresis, initially 50 to 200 mg.; maintenance 25 to 150 mg., daily. Hypertension 50 to 100 mg. initially, adjusted to 50 mg. t.i.d. or downward to minimal effective dosage level.

WARNINGS: Use with caution in the presence of renal disease as azotemia may be precipitated or increased. In patients with advanced hepatic disease, electrolyte imbalance may result in hepatic coma. Dosage of coadministered antihypertensive agents should be reduced by at least 50%. In cases of suspected electrolyte imbalance, serum electrolyte determinations should be performed and imbalance, if any, corrected. Stenosis or ulcer of small intestine have been reported with coated potassium formulas, and surgery has been required and deaths have occurred. Based on surveys of both United States and foreign physicians, incidence of these lesions is low and a causal relationship in man has not been definitely established. Until further experience has been obtained, the use of the drug in pregnant patients should be weighed against possible hazards to the fetus.

CONTRAINDICATIONS: AQUATAG (benzthiazide) is contraindicated in progressive renal disease or dysfunction including increasing oliguria and azotemia. Continued administration of this drug is contraindicated in patients who show no response to its diuretic or antihypertensive properties. Severe hepatic disease is a relative contraindication. (See "Warnings" above.)

PRECAUTIONS AND SIDE EFFECTS: Electrolyte imbalance with hypokalemia (digitalis toxicity may be precipitated), hypochloremic alkalosis and hyponatremia may occur.

Patients with cirrhosis should be observed for impending hepatic coma and hypokalemia. Other reactions may include blood dyscrasias, hyperuricemia and gout, nausea, jaundice, anorexia, vomiting, diarrhea, dizziness, paresthesia, photosensitivity and headache. Hepatic fetor, tremor, confusion and drowsiness are signs of impending pre coma and coma in patients with cirrhosis. Insulin requirements may be altered in diabetes. AQUATAG (benzthiazide) should be used with caution post-operatively as hypokalemia is not uncommon. Potassium supplementation may be advisable pre- and post-operatively. There have been occasional reports of thrombocytopenia, leukopenia, agranulocytosis, aplastic anemia and precipitation of acute pancreatitis or jaundice.

Before prescribing or administering, read the package insert or file card available on request.

Available as 25 or 50 mg. scored tablets.

Request clinical samples and literature on your letterhead.

S.J.TUTAG
& COMPANY
Detroit, Michigan 48234

mail bag

I thought you would be interested in learning that I have again introduced legislation urging that the President award an appropriately designed medal and certificate to certain civilians who voluntarily serve in Vietnam and other combat areas. This bill, House Concurrent Resolution 84, has been referred to the Committee on Banking and Currency.

It was necessary for me to reintroduce this bill inasmuch as all bills not acted upon in the previous Congress are automatically discarded. I certainly hope that favorable action will be taken in this session of Congress.

With warm personal regards,

Sincerely,
JAMES HARVEY
Representative in Congress
8th District in Michigan

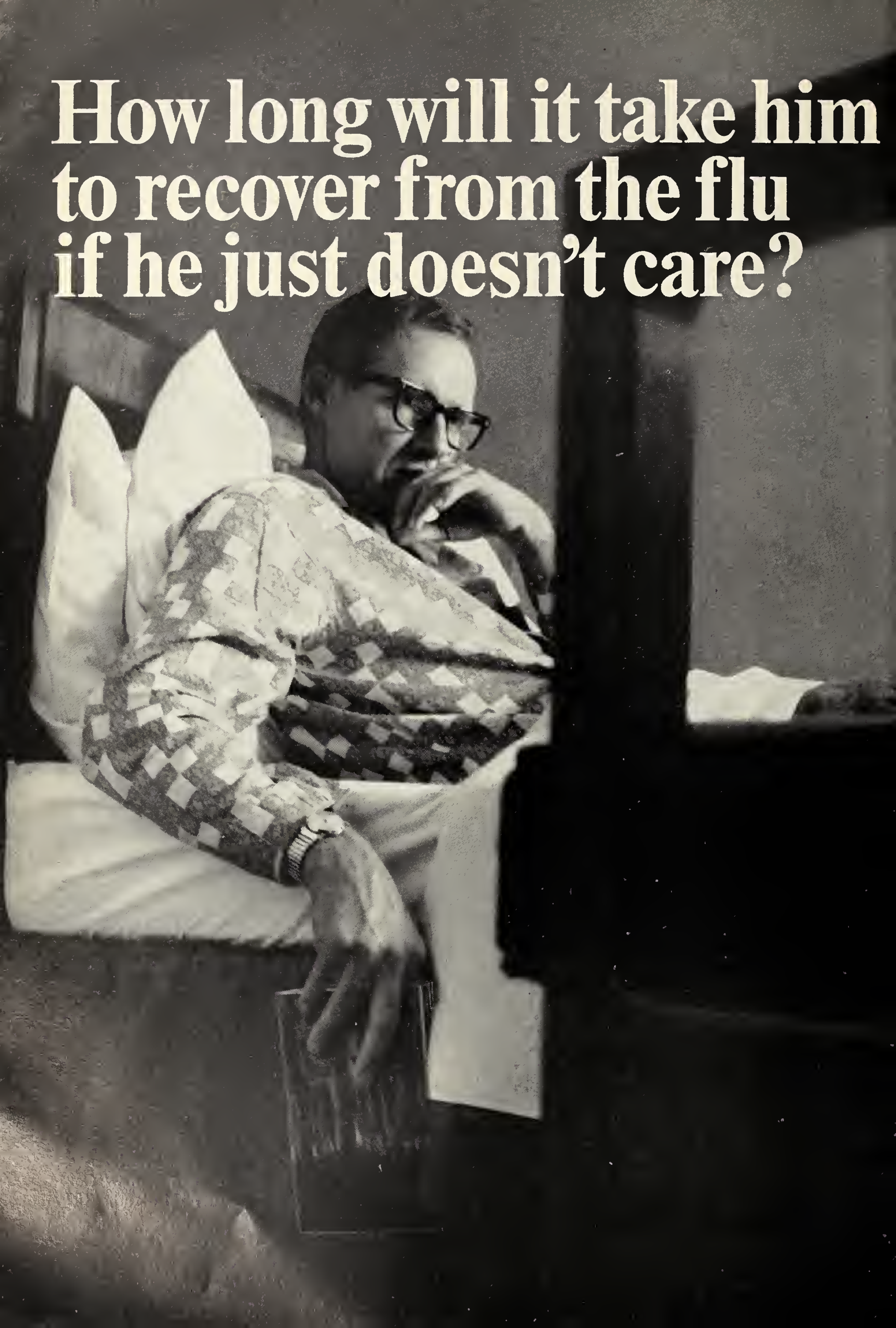
Says Junior High Sports Up To Each School

Contact sports have a definite value for junior high school students, said James S. Feurig, M.D., team physician to Michigan State University, in a talk at the Midwest meeting of the American College of Sports and Medicine. He added, however, that it is up to each school system to decide this controversial question for itself.

Speaking at the University of Michigan, Dr. Feurig pointed out that only when a system has a "very good program serving every student, so that no student is denied physical activity," can contact sports be considered. If a system can meet the necessary conditions, junior high competition can teach boys and girls many necessary lessons like discipline and sacrifice, planning and organization, teamwork and tolerance. It also teaches how to accept defeat, and "this makes a great difference in the kind of person you are; its a real part of the education process," he added.

DOW OFFERS NEW BOOKLET

A new, 12-page booklet explaining the nature and properties of vinyl bromide is now available free from Inorganic and Bromine Chemicals section of Chemicals Sales, The Dow Chemical Company, 2020 Abbott Road Center, Midland, Mich. 48640.


How long will it take him to recover from the flu if he just doesn't care?

**Does he really care?
Is he alert, encouraged,
positive and optimistic
about getting out of bed
and back to work soon?
Or is he giving in to
the depressing impact
of confinement?
When functional fatigue
complicates convalescence,
Alertonic can help...**

Pleasant-tasting Alertonic is pipradrol hydrochloride—an effective cerebral stimulant whose gentle analeptic action helps counteract the apathy and inertia that so often delay convalescence—together with an excellent vitamin and mineral formula, in a satisfying 15% alcohol vehicle.

Nothing fosters confidence and a sense of well-being better than your own personal warmth, understanding and encouragement together with Alertonic to help insure prompt response.

Adequate dosage is important: Prescribe Alertonic—one tablespoonful t.i.d., 30 minutes before meals...tastes best chilled.

And for your patient's sake, prescribe Alertonic in the convenient, economical one-pint bottle.

Alertonic®

Available Only On Prescription

Each 45 cc. (3 tablespoonfuls) contains: alcohol, 15%; pipradrol hydrochloride, 2 mg.; thiamine hydrochloride (vitamin B_1) (10 MDR*), 10 mg.; riboflavin (vitamin B_2) (4 MDR), 5 mg.; pyridoxine hydrochloride (vitamin B_6), 1 mg.; niacinamide (5 MDR), 50 mg.; choline,† 100 mg.; inositol,† 100 mg.; calcium glycerophosphate, 100 mg. (supplies 2% MDR for calcium and for phosphorus) and 1 mg. each of the following: cobalt (as chloride), manganese (as sulfate), magnesium (as acetate), zinc (as acetate), and molybdenum (as ammonium molybdate).

*Multiple of adult Minimum Daily Requirement supplied.
†The need for these substances in human nutrition has not been established.

Indications: 1. Functional fatigue such as that often associated with: a depressing life experience or stressful time of life; advancing years; convalescence; limited activity or confinement. 2. Poor appetite and vitamin-mineral deficiency as they occur in: patients having faulty eating habits; geriatric patients who are losing interest in food; patients convalescing from debilitating illness or surgery.

Contraindications: As with other drugs with CNS stimulating action, Alertonic is contraindicated in hyperactive, agitated or severely anxious patients and in chorea or obsessive compulsive states.

Side effects: Reports of overstimulation have been rare. Patients who are known to be unduly sensitive to the effects of stimulant drugs should be observed carefully in the initial stages of treatment.

Dosage: Adults, 1 tablespoonful; children (over 15 years old), 1 to 2 teaspoonfuls; children (4 to 15 years old), 1 teaspoonful. To be taken three times daily 30 minutes before meals.

Merrell

THE WM. S. MERRELL COMPANY
Division of Richardson-Merrell Inc.
Cincinnati, Ohio 45215

6-7907

SPECIAL REPORT FROM
MICHIGAN BLUE SHIELD

Michigan Blue Shield Reports Progress "Despite Obstinate Problems"

Medicare receipts are rising sharply, John C. McCabe, Michigan Blue Shield President, declared in a special status report on Titles XVIII and XIX.

He said that approximately 125,000 bills were received in January (40 percent higher than December, 1966 receipts), and $1,500,000 were paid out in benefits in the same month.

These figures are in sharp contrast to Blue Shield's experience in the first six months of the Medicare program when 254,000 bills were received, and $2,982,000 were paid out in benefits.

"We are making progress in the face of obstinate problems," Mr. McCabe declared.

"Actually, we have processed more than 250,000 claims since the beginning of Medicare but many did not result in payments because certain deductibles had not been met.

"Also, some services reported for payment were not covered by law, and therefore, were not eligible for payment.

"In effect, for every two bills processed, we have only been able to pay one."

MR. McCABE SAID that Blue Shield's computer system is being refined, and personnel are becoming more familiar with claims in which they had limited or no previous experience.

"With the medical profession and the public gaining more experience with the program, receipts are beginning to have a higher degree of accuracy which assures quicker processing," McCabe said.

"As a service to their patients," he said, "physicians should fill out the claim even if they don't accept assignment."

Concerning administration of the Title XIX program for the State of Michigan, Mr. McCabe said that as of January 20, 1967, Blue Shield received approximately 20,000 claims for professional services. These claims are being processed with a minimum difficulty. The major problem involves receipt of eligibility information.

IN ADDITION TO claims for medical services, Blue Shield has received approximately 4,000 claims for prescribed drugs. The projected volume of these claims is approximately 45,000 per month.

"As a result of cutbacks in the Title XIX program in the January and April, 1967 benefit implementation schedule, the claims volume which was originally anticipated has not been realized," Mr. McCabe said.

"The cutbacks have resulted in a reduced benefit scope for the medically indigent concerning physicians' home and office calls and prescribed drugs. Benefits scheduled to begin on April 1 for dental services, optical procedures, and prosthetic devices have been postponed indefinitely.

ADDITIONAL MEDICARE REPORTS AVAILABLE

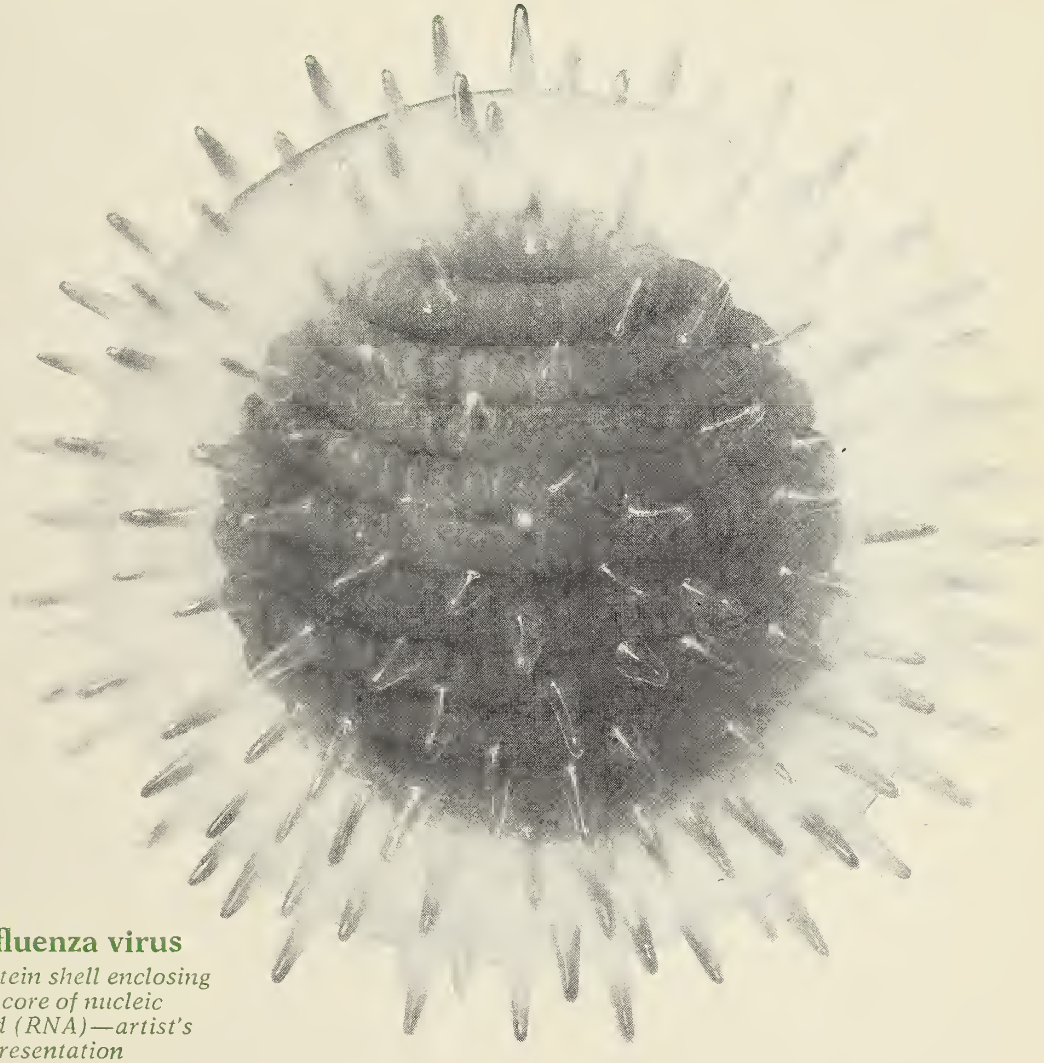
Michigan Blue Shield sent a special report on Medicare early in February to all physicians describing its experience as a carrier for the federal government. The report covers administrative and operational developments during the first six months after Medicare became effective July 1, 1966. Additional copies of the report may be obtained on request from Blue Shield Public Relations, 441 East Jefferson, Detroit, Mich. 48226.

New from Du Pont

Symmetrel®

(Amantadine HCl)

The first oral chemical virostat for the prevention of influenza A_2



Influenza virus

Protein shell enclosing the core of nucleic acid (RNA)—artist's representation

The incidence of influenza A_2. In this country, where influenza is one of the leading causes of morbidity, influenza A_2 (Asian) continues to be a serious medical problem. In 1957 influenza A_2 was responsible for approximately 40,000 excess deaths in a three-month period. Since that year the most prevalent influenza virus has been A_2 (Asian).

What is Symmetrel®? "Symmetrel" (amantadine HCl) is a new synthetic chemical which acts as a molecular barrier to virus penetration. It provides for the first time specific oral medication for the prevention of respiratory infections caused by influenza A_2 (Asian) viruses—an entirely new approach in preventive medicine.

For prescribing information, see last page of this presentation

What Symmetrel® (amantadine HCl) means to you

...the first and only oral chemical agent to prevent influenza A_2 (Asian).

...not a vaccine or antibiotic, but a new synthetic chemical unrelated to any other chemotherapeutic agent.

...unique mode of action: prevents virus penetration of the host cell without affecting vital cell functions.

...specifically active against all influenza A_2 viruses tested to date.

...not indicated for the prevention of influenzal or respiratory illness other than influenza A_2 or for the treatment of established disease.

...does not interfere with normal antibody response; acts in concert with pre-existing antibody.

What Symmetrel® means to your patient

...possible immediate influenza A_2 protection when taken following suspected contact.

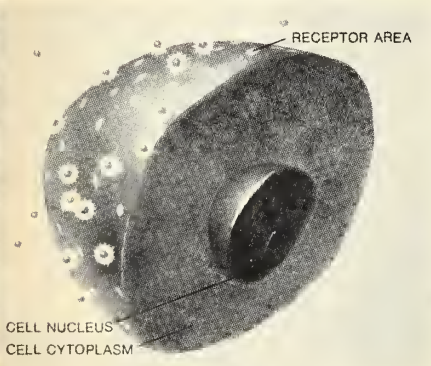
...may be particularly useful during outbreaks or epidemics and for high-risk patients in whom the occurrence of influenza A_2 is especially hazardous.

...a high degree of safety in clinical use.

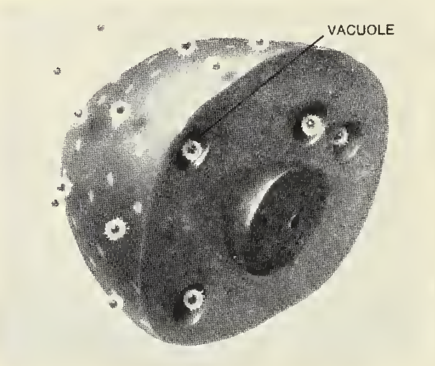
...simple once daily or b.i.d. dosage.

The mode of action of Symmetrel®

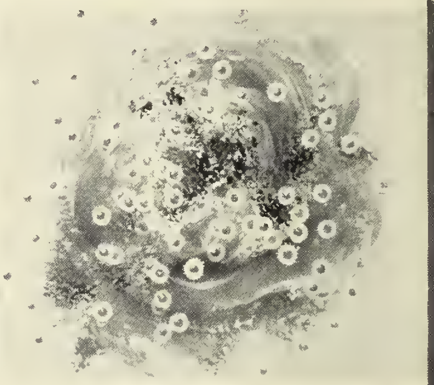
How the influenza virus invades and destroys the untreated cell



1 Viruses outside the cell attach themselves to specific cell receptor areas

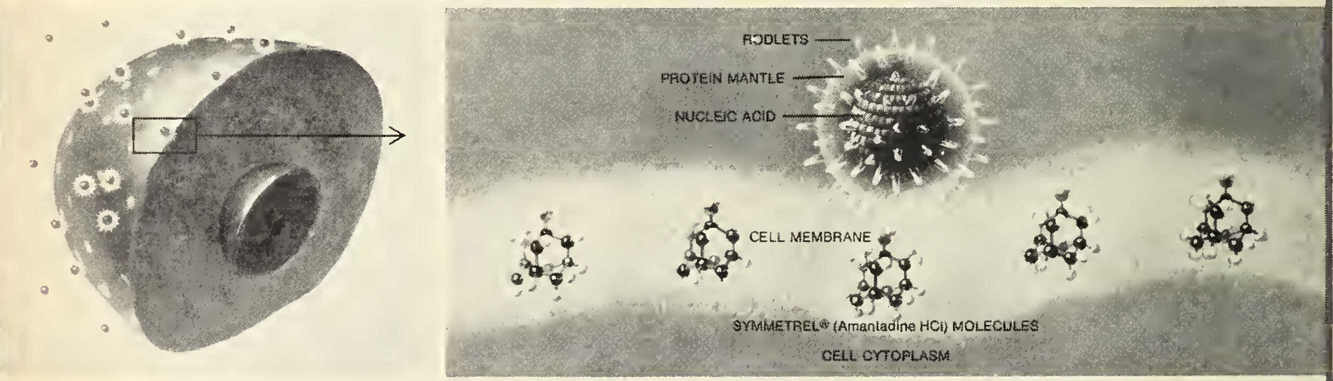


2 The virus is incorporated into a vacuole within the cell. From this vacuole the virus nucleic acid passes into the cell cytoplasm



3 The virus nucleic acid then directs the cell to produce both new virus nucleic acid and virus protein coat material which aggregate to form new virus particles. This process leads to the release of new virus particles and eventual destruction of the cell

How Symmetrel® (Amantadine HCl) prevents virus invasion[1]



Our current knowledge leads us to believe "Symmetrel" acts as a molecular barrier to influenza virus penetration. Shown here in a greatly enlarged section, "Symmetrel"—located at the cellular membrane—effectively prevents (blocks) virus penetration. Thus, "Symmetrel" does not directly destroy the virus particle but acting as a virostat prevents the cycle of virus penetration, virus replication, and cell destruction that is characteristic of virus invasion of animal cells (tissue). *Artist's conception based on current scientific knowledge.*

[1] "Mode of Action of the Antiviral Activity of Amantadine in Tissue Culture", Hoffmann, C. E.; Neumayer, E. M.; Haff, R. F.; and Goldsby, R. A., Journal of Bacteriology *90*,623 (1965).

Safety of Symmetrel® Confirmed. When used as indicated, is generally well tolerated. No kidney, liver, bone marrow, or hematological disturbances have been observed.

Prescribing Information

Indications: "Symmetrel" is indicated for the prevention (prophylaxis) of influenza A_2 in persons of all age groups. Early use is recommended, preferably before or as soon as possible after actual or suspected contact with individuals suffering from influenza A_2. "Symmetrel" should especially be considered for high influenza-risk patient groups such as those suffering from chronic debilitating diseases and elderly persons.

Contraindications: Not indicated for the prevention of influenzal or respiratory illness other than influenza A_2 or for the treatment of established disease.

Warnings: Administration to patients with central nervous system disease, particularly geriatric patients with cerebral arteriosclerosis, and patients with a history of epilepsy or other "seizures," requires strict observation for possible untoward effects (see Adverse Reactions). Patients taking psychopharmacologic drugs, central nervous system stimulants, or alcoholic beverages should be observed for possible evidence of intolerance. Those patients who experience central nervous system effects or blurring of vision should be cautioned against driving or working in situations where alertness is important.

No teratogenic effects have been seen in reproductive studies in rats and rabbits. Studies in pregnant women have, however, not been done and use of this drug in women of childbearing age should be undertaken only after weighing the possible risks to the fetus against benefit to the pregnant patient. It should not be administered to nursing mothers since it is not known whether the drug is secreted in the milk.

Precautions: Ineffective against bacterial infections. Patients should be observed for idiosyncratic reactions as with all new drugs. Geriatric patients with pre-existing serious medical illnesses with mental or physical deterioration should be followed carefully medically while taking "Symmetrel." (See Adverse Reactions.)

Adverse Reactions: With higher than indicated doses manifestations of central nervous system effects such as nervousness, insomnia, dizziness, lightheadedness, drunken feeling, slurred speech, ataxia, inability to concentrate and some psychic reactions including depression and feelings of detachment were seen. Occasional blurred vision was reported at higher doses. Some of the milder and less pronounced symptoms above have been reported in a small number of patients taking the recommended dosage of 200 mg per day. Those were mostly transient and disappeared with continued administration of the drug. Some geriatric patients developed paranoid or hallucinatory behavior and became unmanageable while taking 200 mg daily. Medically unselected seriously deteriorated geriatric patients showed poor clinical tolerance after several weeks of daily dosing with 200 mg per day. One elderly patient with a history of prior cerebrovascular accident developed visual hallucinations and grand-mal convulsions while on drug at 800 mg per day. Some cases of dry mouth, gastrointestinal upset and skin rash and rarely, tremors, anorexia, pollakiuria, and nocturia have been also reported.

Safety: When used as indicated, is generally well tolerated. No kidney, liver, bone marrow, or hematological disturbances have been observed.

Dosage: *Adults:* Two 100 mg capsules (or 4 teaspoonfuls of syrup) as a single daily dose or the daily dose may be divided into one capsule of 100 mg (or 2 teaspoonfuls of syrup) twice a day.

Children: 1 yr.—9 yrs. of age: Calculate total daily dose on the basis of 2 mg to 4 mg per pound of body weight per day (but not to exceed 150 mg per day). Daily dose, given as the syrup, should be given in 2 or 3 equal portions.

9 yrs.—12 yrs. of age: Total daily dose 200 mg given as one capsule of 100 mg (or 2 teaspoonfuls of syrup) twice a day.

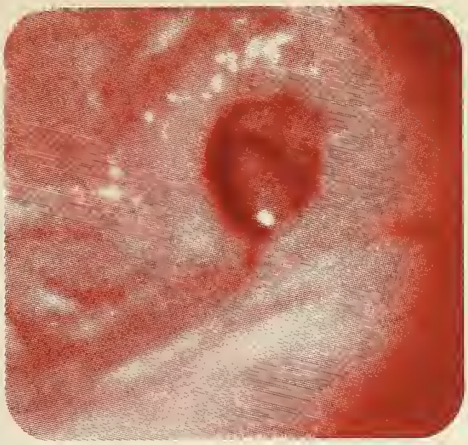
How Supplied: *Capsules:* Bottles of 100. Each red, gelatin capsule contains 100 mg amantadine HCl.
Syrup: Bottles of 1 pint. Each 5 ml (1 teaspoonful) contains 50 mg amantadine HCl.

DU PONT
REG. U. S. PAT. OFF.

Symmetrel®
(Amantadine HCl)
A molecular barrier to virus penetration

NEW EVIDENCE:

Pro-Banthīne® (propantheline bromide) **gives positive, selective benefits in gastrointestinal disorders.**



Intragastric photograph of pyloric region showing complete relaxation of pyloric sphincter with 6 mg. of Pro-Banthīne intravenously.

An important problem in managing gastrointestinal disorders has been the choice of an anticholinergic agent which will act positively and selectively on the gastrointestinal tract without extensive secondary effects.

Recent direct observations with the cinefibergastroscope and intragastric photography[1] visually confirm previous evidence that Pro-Banthīne does, indeed, possess such selective activity.

Barowsky and his associates demonstrated that a minimal dose of 6 to 8 mg. of Pro-Banthīne intravenously produced complete relaxation of gastric activity. Secondary effects were not significant.

By contrast, it required 0.8 mg. or double the usual dose of atropine intravenously to achieve similar gastric relaxation. Side effects of this dosage of the belladonna alkaloid were pronounced. Ventricular rates were as high as 150 per minute.

For positive, selective anticholinergic benefits Pro-Banthīne is indicated in patients with peptic ulcer, gastritis, irritable colon and other forms of gastrointestinal hypermotility.

Dosage: The maximal tolerated dosage is usually the most effective. For most *adult* patients this will be four to six 15-mg. tablets daily in divided doses. In severe conditions as many as two tablets four to six times daily may be required. Pro-Banthīne (brand of propantheline bromide) is supplied as tablets of 15 mg., as prolonged-acting tablets of 30 mg. and, for parenteral use, as serum-type ampuls of 30 mg. The parenteral dose should be adjusted to the patient's requirement and may be up to 30 mg. or more every six hours, intramuscularly or intravenously.

Contraindications: In glaucoma or severe cardiac disease.

Precautions: Since varying degrees of urinary hesitancy may occur in the elderly male with prostatic hypertrophy, this should be watched for in such patients until they have gained some experience with the drug.

Although never reported, theoretically a curare-like action may occur with possible loss of voluntary muscle control. Such patients should receive prompt and continuing artificial respiration until the drug effect has been exhausted.

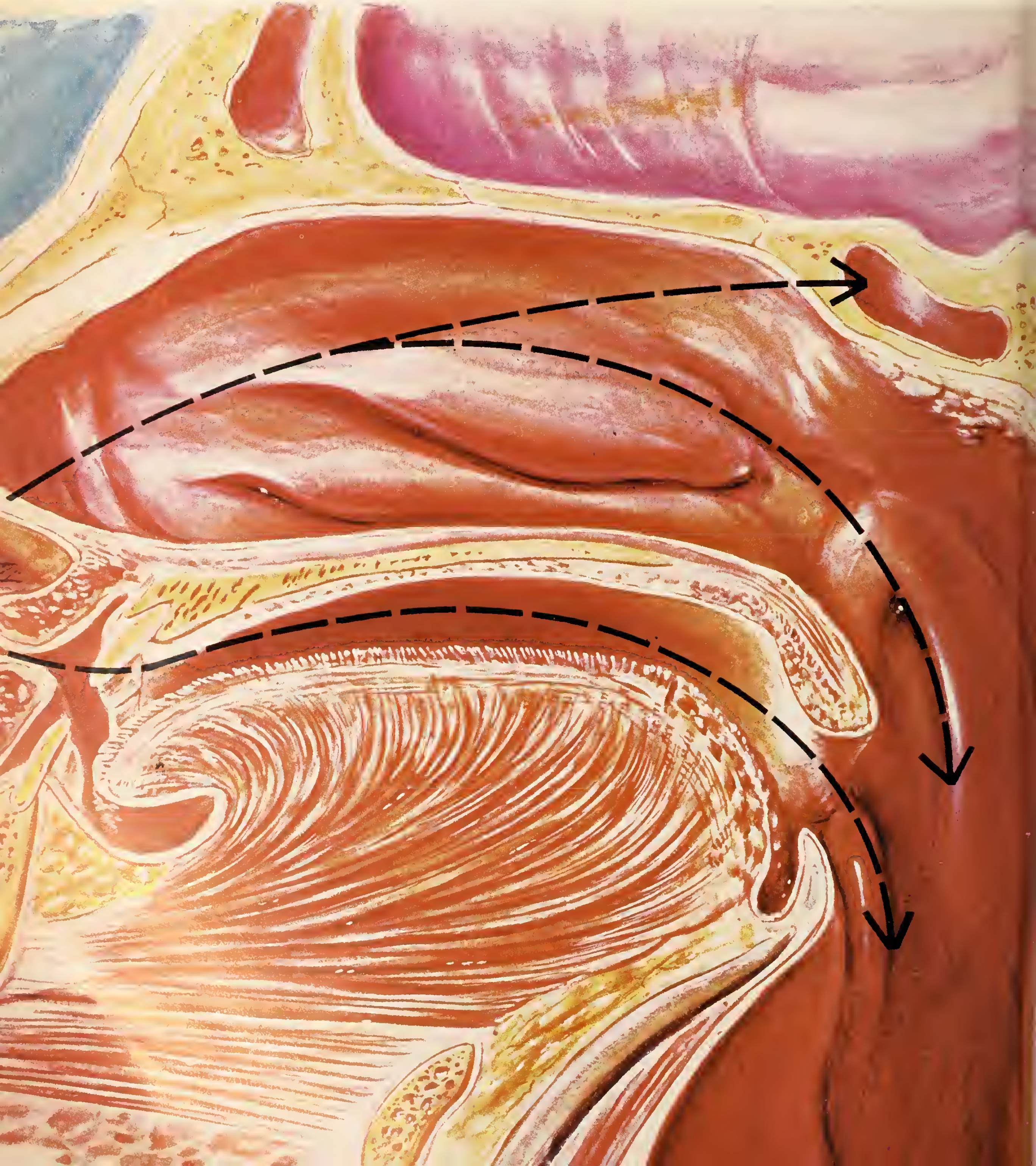
Side Effects The more common side effects, in order of incidence, are xerostomia, mydriasis, hesitancy of urination and gastric fullness.

[1] Barowsky, H.; Greene, L.; Bennett, R., and Buganza, G.: The Effect of Anticholinergic Drugs on Gastric Motility and Pyloric Function, Scientific Exhibit, Annual Convention of the American Medical Association, Chicago, Illinois, June 26-30, 1966.

SEARLE *Research in the Service of Medicine*

When the battle with bacteria is in the upper respiratory tract

Routes of invasion through the oral and nasal passages to the nasopharyngeal mucosa: artist's depiction of sagittal section of head in perspective.



consider Gantanol (sulfamethoxazole)

To rapidly help the patient win against upper respiratory infections

When the respiratory tract has been invaded, an antibacterial that can assure effective yet generally uncomplicated therapy is your first line of defense...an agent such as Gantanol (sulfamethoxazole), the wide-spectrum antibacterial from Roche.

Gantanol (sulfamethoxazole) is effective against common susceptible upper respiratory pathogens, both gram-positive and gram-negative. Acting at foci of bacterial invasion, Gantanol (sulfamethoxazole) promptly helps control most infections, yet usually presents few problems to patients. Dosage is convenient and provides a measure of economy.

Before prescribing, please consult complete product information, a summary of which follows:

Contraindicated in sulfonamide-sensitive patients, pregnant females at term, premature infants, or newborn infants during first three months of life.

Warnings: Use only after critical appraisal in patients with liver damage, renal damage, urinary obstruction or blood dyscrasias. If toxic or hypersensitivity reactions or blood dyscrasias occur, discontinue therapy. In intermittent or prolonged therapy, blood counts and liver and kidney function tests should be performed.

Precautions: Observe usual sulfonamide therapy precautions, including maintenance of an adequate fluid intake. Use with caution in patients with histories of allergies and/or asthma. Patients with impaired renal function should be followed closely since renal impairment may cause excessive drug accumulation. Occasional failures may occur due to resistant microorganisms. Not effective in virus or rickettsial infections.

Adverse reactions: Headache, nausea, vomiting, urticaria, diarrhea, hepatitis, pancreatitis, blood dyscrasias, neuropathy, drug fever, skin rash, Stevens-Johnson syndrome, injection of the conjunctiva and sclera, petechiae, purpura, hematuria or crystalluria may occur, in which case the dosage should be decreased or the drug withdrawn.

Dosage: Adults—4 tablets initially, then 2 tablets b.i.d. or t.i.d. depending upon severity of infection. Children—1 tablet/20 lbs initially, followed by ½ tablet/20 lbs b.i.d.

How supplied: Tablets, 0.5 Gm, bottles of 50.

Roche Laboratories, Division of Hoffmann-La Roche Inc., Nutley, N. J. 07110

When there are bacterial invaders in the upper respiratory tract

Gantanol®
(sulfamethoxazole)

ROCHE

"Yes, Doctor, the pain is gone."

■ Despite introduction of synthetic substitutes, efficacy of 'Empirin' Compound with Codeine remains unchallenged.

'Empirin'® Compound with Codeine Phosphate gr. ½ No. 3
Each tablet contains: Codeine Phosphate gr. ½ (Warning – May be habit forming), Phenacetin gr. 2½, Aspirin gr. 3½, Caffeine gr. ½.

Keeps the Promise of Pain Relief

BURROUGHS WELLCOME & CO. (U.S.A.) INC., Tuckahoe, N. Y.

Amendments Sought in Federal Social Securities Law by AMA

Michigan physicians are urged by Luther R. Leader, M.D., Chairman of the MSMS Delegation to the AMA, to study the proposed changes being sought by the AMA in Public Law 88-97, the Social Security Amendments of 1965.

Doctor Leader also pointed out that the AMA House of Delegates or Board of Trustees have approved these proposed amendments:

PROPOSED TITLE XVIII AMENDMENTS

1. RECEIPTED BILL: That the Social Security Act be amended to permit the reimbursement of charges for professional services on the basis of a physician's statement of charges rather than upon a receipted bill.

2. PHYSICIAN CERTIFICATION: That the Social Security Act be amended to remove the requirement for physician certification of the medical necessity of care rendered.

3. PRIOR HOSPITALIZATION: That the Social Security Act be amended to remove the requirement for 3 days of hospitalization so as to qualify for extended care benefits.

PROPOSED TITLE XIX AMENDMENTS

4. DIRECT PAYMENT: Title XIX should permit direct payment by the patient of physician charges, with the patient receiving reimbursement from the government.

5. FREE CHOICE OF PHYSICIAN AND FACILITY: Title XIX should require that the patient may exercise free choice of physician; and further amended to provide that patient may not be compelled to receive medical care in facility not of his choosing.

6. USUAL AND CUSTOMARY CHARGES: Title XIX programs should provide for the payment of physician fees on the basis of his usual and customary charges.

7. USE OF INSURANCE CARRIERS: Title XIX should encourage the use of insurance carriers in the implementing of state programs.

8. ADMINISTRATIVE COSTS: Title XIX should be amended to provide that the federal percentage of matching funds for program administration costs should not be affected by the identity of the state agency incurring the expense. Under current law, if the state welfare department administers the program, the federal share is 75%. If the state health department administers the program, the federal share is only 50%.

9. VARIABLE ELIGIBILITY STANDARDS: Title XIX should permit all state plans to vary eligibility standards within a state so as to recognize differences in the cost of living.

10. NATIONAL ADVISORY COUNCIL: Title XIX should provide for a national advisory council to the Secretary of HEW and should include physician-representatives of medical associations.

PHYSICIAN ELIGIBILITY FOR SOCIAL SECURITY BENEFITS

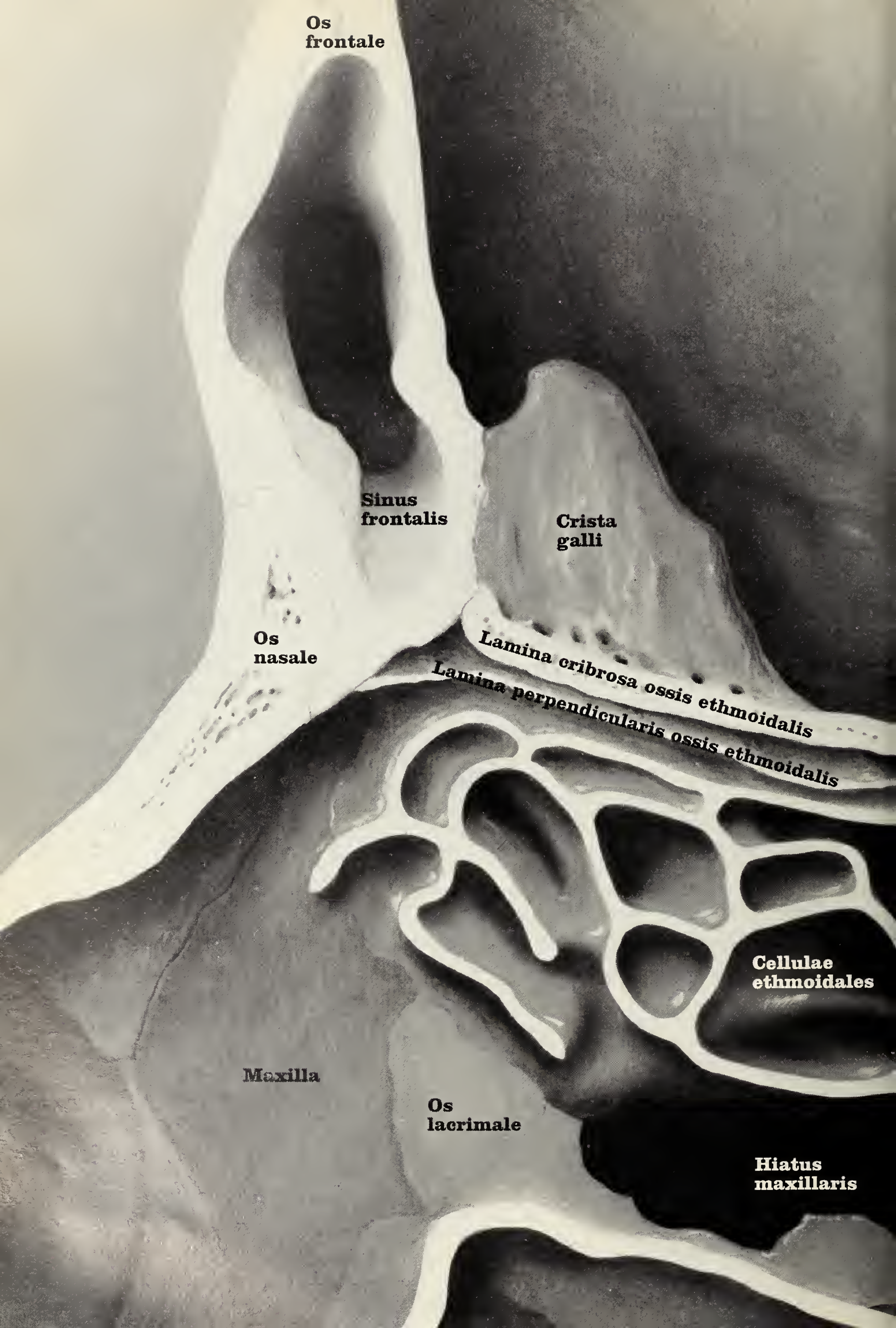
11. CHANGES IN QUALIFYING DATES AND COMPUTATION OF BENEFIT: To provide that physicians (and others) who came under the provisions of the Social Security laws for the first time (by virtue of the passage of Public Law 89-97), will be given an opportunity to obtain adequate coverage by providing for (1) earlier eligibility, and (2) an alternate method of computing the amount of benefits.

Add: About Doctors

Robert A. Braun, M.D., Detroit, has been elected president of the Michigan Association of Neuropsychiatric Hospital and Clinic Physicians.

Steven J. Figiel, M.D., Detroit, is now president of the Detroit Gastroenterologic Society.

Two Michigan physicians have been honored by the American College of Radiology. Howard Feigelson, M.D., Detroit, and Zachary Endress, M.D., Bloomfield Hills, were given fellowship degrees by the College.


Os frontale
Sinus frontalis
Crista galli
Os nasale
Lamina cribrosa ossis ethmoidalis
Lamina perpendicularis ossis ethmoidalis
Cellulae ethmoidales
Maxilla
Os lacrimale
Hiatus maxillaris

Sinus headache is not a single entity, but a chain reaction of pain. It is facial pain—deep, dull, aching and nonpulsating. It is referred pain—originating in the nose and sinuses but felt at another site. It may become generalized pain and tension in head and neck. It is one or all of these. The Sinutab formula is designed for symptomatic relief of sinus headache. It provides two analgesics to relieve pain and discomfort...an effective oral decongestant to reduce mucosal congestion... and an antihistamine to help control allergic manifestations. *Side Effects:* Epigastric distress, drowsiness, dizziness, insomnia and nervousness. *Precautions:* Instruct patients not to drive or operate machinery if drowsiness occurs. Use with caution in patients with thyroid disease, heart disease, hypertension, diabetes or kidney disease. Excessive dosage or prolonged use may cause kidney damage. *Dosage:* Adults—2 tablets every 4 hours.

special formula
for a
special problem

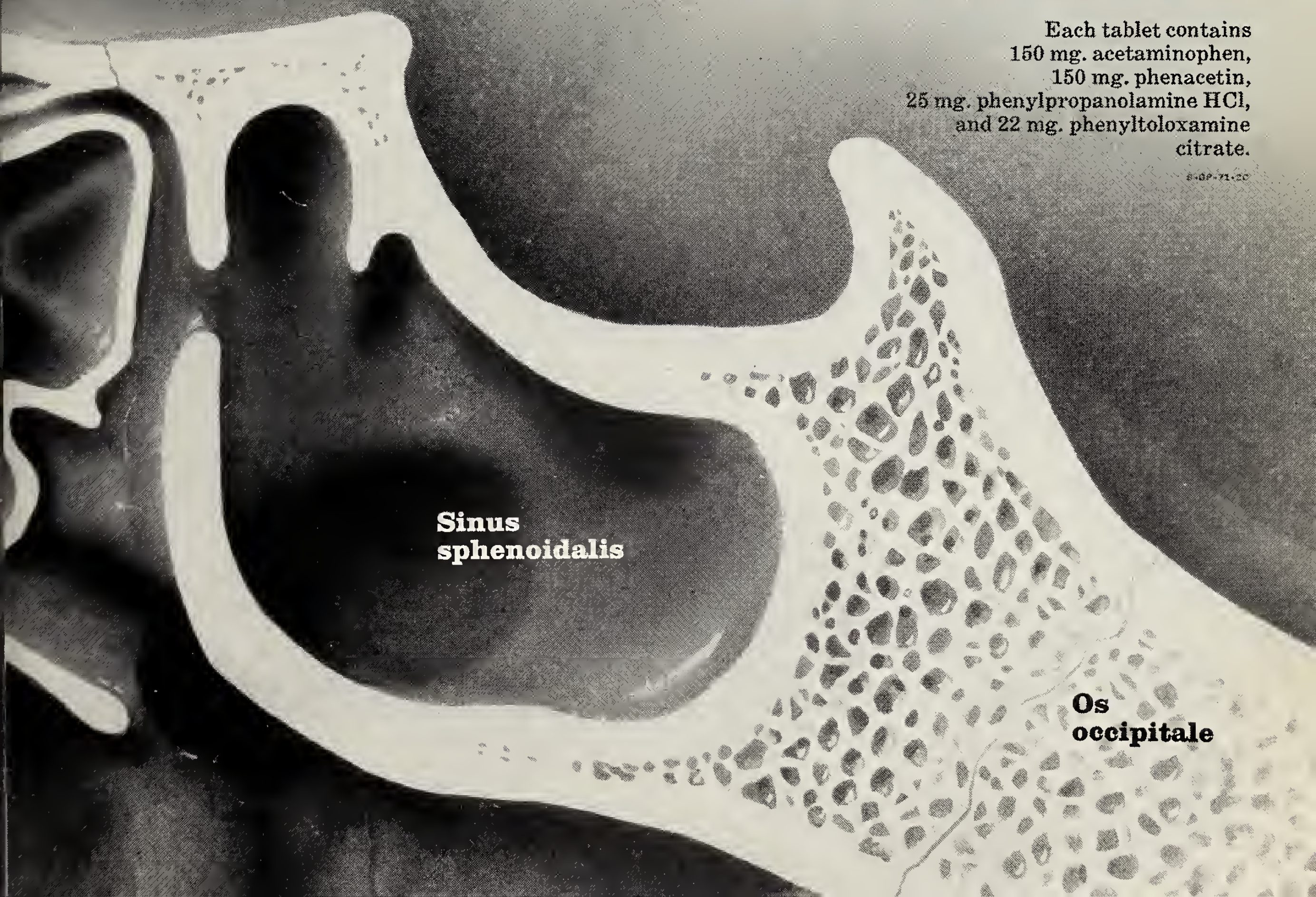
WARNER-CHILCOTT
Morris Plains, N.J.

specifically formulated
for symptomatic
relief of sinus headache

SINUTAB®
for sinus headache

Each tablet contains
150 mg. acetaminophen,
150 mg. phenacetin,
25 mg. phenylpropanolamine HCl,
and 22 mg. phenyltoloxamine
citrate.

8-0P-71-20



1,500 Deaths Annually, Many Needlessly

BY GEORGE H. LOWREY, M.D.
SCIENTIFIC EDITOR, MICHIGAN MEDICINE

What are the responsibilities of a physician to help reduce accidental poisonings?

How can a physician protect the families he cares for from accidental poisonings and deaths?

Poisoning is one of the common accidents of childhood. In many instances the parents are unaware that the agent ingested is toxic and often the label on the container, even if read, does not convey the potential danger.

AS PHYSICIANS, we can become fully informed of the circumstances surrounding these events and we must bring to the attention of the public, most effectively on a person-to-person basis, the important preventive measures which are implicit in the statistics gathered by the Poison Control Centers. Repeated instruction concerning the ways to prevent accidental poisoning is as important a part of medical care as immunization against the preventable infectious diseases and should start at approximately the same time.

Physician attention is called to the problems of poison prevention in an effort to help observe National Poison Prevention Week March 19-25.

The exact figures for the total number of deaths due to accidental poisoning in the United States will probably never be accurately known. Some of these fatalities are never recognized as being caused by poisoning either because it is not suspected or facilities for complete investigation are unavailable.

Our best statistics would indicate that something in the neighborhood of 1500 deaths occur annually while the estimated number of nonfatal poisonings is approximately 1,000,000 a year. Most of these accidental poisonings, both fatal and nonfatal, occur in the preschool age group.

Within the past 10 to 15 years a large number of poison information and therapy centers have been established throughout the United States and Canada. More recently, similar services have been furnished in some of the European countries.

Although figures can sometimes be misleading, it is a little discouraging to note that there has been no general downward trend in the frequency of accidental poisoning since the establishment of these poison centers. Directors of such centers on a local, state, national and even international basis have launched campaigns repeatedly for poison prevention.

LIKE MANY OTHER safety campaigns, it needs to be emphasized that the individual must be repeatedly bombarded with propaganda in order to make an effective program in preventive medicine. The physician can and must play an important role in this campaign if any degree of success is to be realized.

Perhaps one of the reasons that we have not been as successful as we might have been in the past is that we have diluted our information by giving too many facts to parents of children who

What can be done for Susan Jane To stop the runs and crampy pain?

Parepectolin for quick relief of acute diarrhea
...soothes colicky pain with paregoric
...consolidates fluid stools with pectin
...adsorbs irritants with kaolin, and protects intestinal mucosa.

In children, Parepectolin may be used to control diarrhea promptly and prevent dehydration, until etiology has been determined. In some cases, Parectolin may be all the therapy necessary.

Parepectolin®

Each fluid ounce of creamy white suspension contains:
Paregoric (equivalent).........(1.0 dram) 3.7 ml.
Contains opium (¼ grain) 15 mg. per fluid ounce.
warning: may be habit forming
Pectin.....................(2½ grains) 162 mg.
Kaolin (specially purified)....(85 grains) 5.5 Gm.
(alcohol 0.69%)
Usual Children's Dose: One or two teaspoonfuls three times daily.

RORER
WILLIAM H. RORER, INC.
Fort Washington, Pa.

are potentially in danger from poisoning. If we could prevent just the poisonings that are caused by medications, more than 50% of the fatalities would be eliminated. A brief description of the epidemiology of poisoning will point out the necessary measures we need to take toward prevention.

Almost all poisonings occur in the home. Most poisonings occur when the mother is in the home at the time, though not necessarily in the same room as the child.

The most dangerous age group in terms of frequency of fatalities is from one to three years. This is the group in which inquisitiveness is a motivating force, and this leads to frequent tasting of anything that the child can reach. It also must not be forgotten that they are good improvisers in making the equipment to reach "safe" places. This is an age group that must be protected; they cannot be taught to avoid potentially dangerous situations. Discipline by parents is a must.

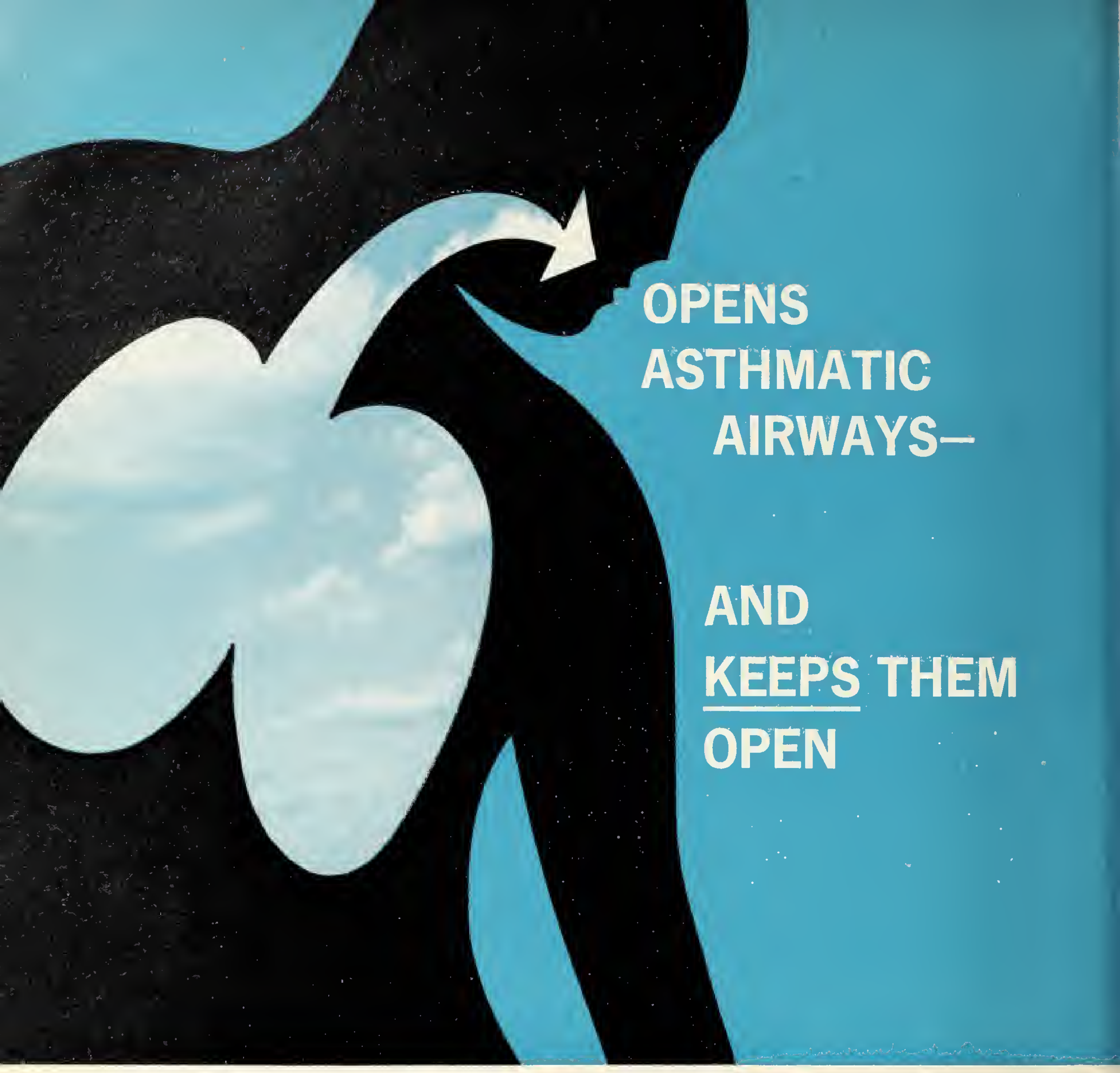
OF ALL THE medications involved, aspirin leads the list.

In this country 50% of all fatalities are due to the ingestion of an overdose of aspirin in some form or another. Nearly every home has aspirin in it, and unfortunately most parents do not realize that this can be a lethal product. The family physician must constantly stimulate parents of small children to take inventory and to remove the danger. In spite of efforts to manufacture safety packaging for medicines, the ideal has not yet been realized.

Tranquilizers, barbiturates and various hormone preparations follow in that order as being most frequently involved after the salicylates. Two important musts for the physician in relation to the prevention of ingestion with these drugs are:

1. Prescribe only that amount of medication which is needed for a particular episode. This would help to reduce the number of leftover medications that may be found on the bedside table and in the bathroom cabinet.
2. Give very specific instructions not only as to the use of the medication but also proper storage to prevent poisoning.

It is an interesting comment on our way of life that tranquilizers have overtaken barbiturates as the second most common cause of poisoning and that hormone preparations to prevent pregnancy may soon displace all others with the exception of the salicylates.



NUMA® **DURA-TABS**®
for *prolonged* aid to ventilation

Each Numa Dura-Tab provides:

theophylline	225 mg.
ephedrine HCl	50 mg.
butabarbital	25 mg.

(Warning: butabarbital may be habit-forming.)

Numa Dura-Tabs provide *prolonged* three-way action to ease breathing. Theophylline, a potent bronchodilator with minimal effect on the CNS, opens air passages and reduces bronchial spasm. Ephedrine HCl improves breathing capacity through its decongestant action. Butabarbital, a mild sedative, allays fear and apprehension.

Dosage: One Numa Dura-Tab every 8 to 12 hours helps keep the asthmatic patient symptom-free all day/all night.

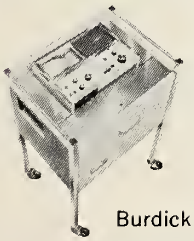
Precautions: Use with caution in cardiovascular or hyperthyroid disease, severe hypertension, circulatory collapse, prostatic hypertrophy, or glaucoma.

WYNN Pharmaceuticals, Inc. Phila., Pa. 19132 • Manufacturers of QUINAGLUTE® DURA-TABS®
(Quinidine Gluconate 5 gr.)

"Extra hands" to help you

EK 4 Electrocardiograph

Taking **electrocardiograms; transmitting** ECGs via **telephone; recording phonocardiograms** and **photomotograms** (Achilles tendon reflex) with auxiliary equipment; a **teaching-aid** in medical schools. The Burdick EK 4 becomes a many-dimensioned diagnostic facility to reduce the need for patient referral thus strengthening your physician-patient relationship. Burdick's dual-speed EK 4 offers the latest innovations in ECG equipment—yet stresses dependability and diagnostic accuracy as always. Serviced through technically-knowledgeable dealers who know the equipment and understand the needs of the doctor—little wonder the Burdick electrocardiograph is the choice of so many medical schools, teaching institutions.



Burdick EK 4 Console Unit

THE BURDICK CORPORATION
MILTON, WISCONSIN 53563
THE G. A. INGRAM COMPANY
4444 Woodward Avenue, Detroit, Michigan 48201
Telephone: TEmple 2-4444

Nothing More?

(Remembering the Example of
Sir William Osler)

"There's nothing more we can do."
Gravely the words, heavy, defeated.
White lips, bowed head, pounding heart,
Hoping the mother will check her grief,
Hoping the nurse will not look up.
"Don't blame me,
No one could have done more!"
X-rays, penicillin, transfusions,
Specialists, oxygen, surgery,
Talk fast, doctor, beat down your
Fear with words, and make them big.
Excuse yourself, clear yourself,
Make them say "We know, we're grateful for all
  you did."
What good now are tears?
Damn it, *why* this fear in my chest?
Shaping my words into hollow sounds.
Why the doubt, the bitterness,
The weight of my self-heavy world
Lying upon my heart.
No man can say the diagnosis wrong,
Or the treatment incomplete;
You alone know your guilt.
The days when you cheerfully lied to him.
"To keep his spirits up," you said.
The promises, the hypodermics, the long hours
  by himself
In a neat and clean and inexpressibly lonely room,
The times you turned away
From those starving eyes — frightened by the
  urgency of their need,
Sickened by their onslaught upon your iron will,
Built so carefully to hide so much
Of self-love, and pride.
Oh doctor, cure thyself this day
And learn to live Christ's message of love and
  hope and abiding faith.
Give of your heart as well as your skill,
Acknowledge your dependency on Him,
And pray that you may grow in grace in wisdom
That when the next eyes beg, your caring will
  help them see His presence
And close upon eternal light.

1958
Arthur W. Allen, M.D.

Dr. Allen, of Ann Arbor, died late in 1966, and his wife has given Michigan Medicine permission to print this.

Sustained circulatory, respirator
and cerebral stimulation for th

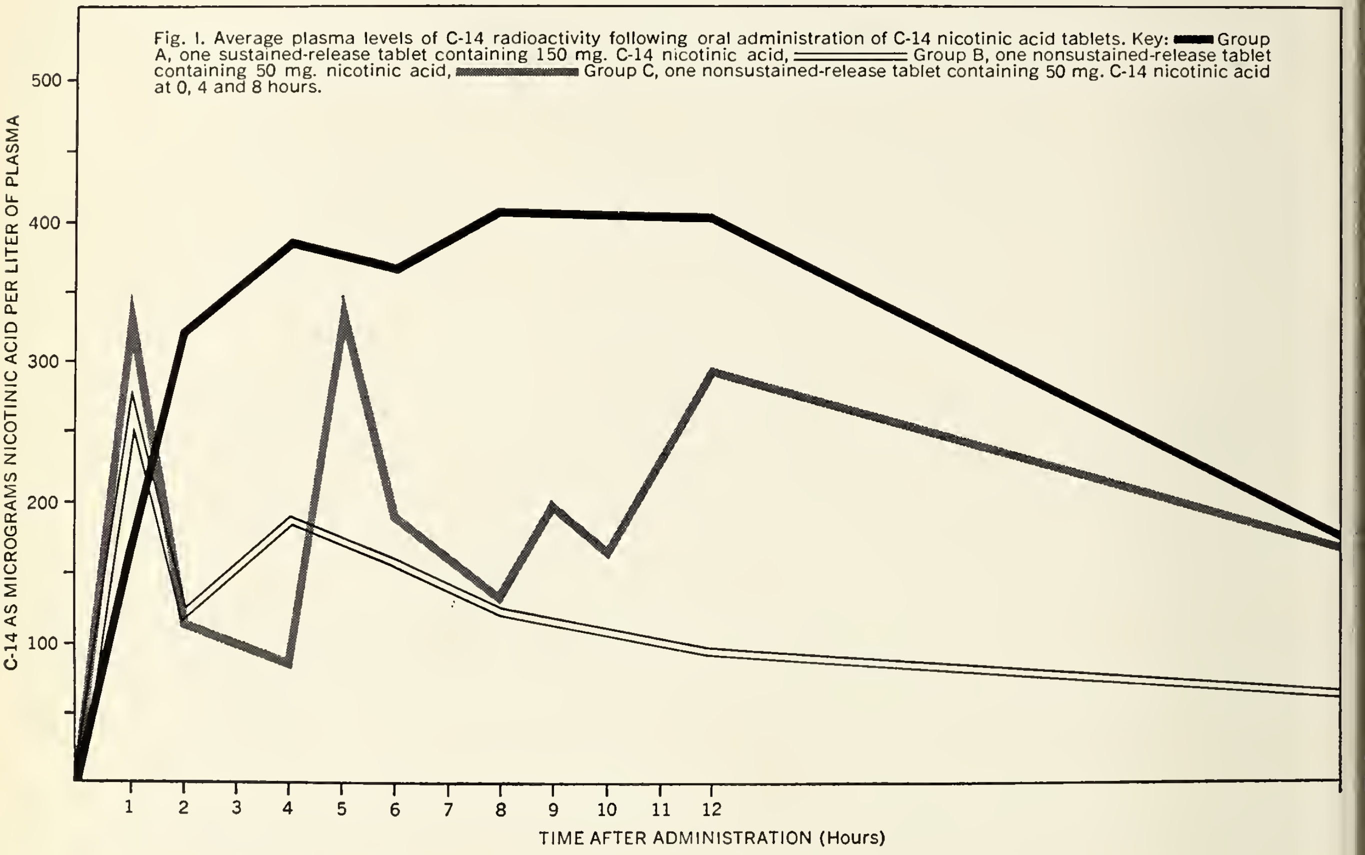


Fig. I. Average plasma levels of C-14 radioactivity following oral administration of C-14 nicotinic acid tablets. Key: ▬ Group A, one sustained-release tablet containing 150 mg. C-14 nicotinic acid, ═ Group B, one nonsustained-release tablet containing 50 mg. nicotinic acid, ▬ Group C, one nonsustained-release tablet containing 50 mg. C-14 nicotinic acid at 0, 4 and 8 hours.

(fewer absent doses by absent-minded patients)

Human volunteer subjects were administered Geroniazol TT tablets with the nicotinic acid component made radioactive with C-14. Plasma and urine samples were analyzed. (See Figures I and II) The radioactive tracer study substantiated the previous clinical evidence that the release of nicotinic acid from the Geroniazol TT tablet produced a gradual rise in plasma levels to a plateau for a total of 12 hours and more.

Such proven sustained activity makes the management of geriatric patients much easier by minimizing the possibility of neglected doses through absent-mindedness or senile confusion. Therapy *can* be continuous on a daily dose of only one Geroniazol TT tablet every 12 hours.

The gradual release of nicotinic acid in Geroniazol TT will provide the well-known peripheral vasodilatation needed in patients with deficient circulation and with a minimum amount (if any) of "flushing." Also, cerebrovascular circulation is complemented by pentylenetetrazol, long-established as a cerebral and respiratory stimulant.

Geroniazol TT improves the typical, unfortunate, signs of senile confusion. Patients become more alert,

ged and debilitated

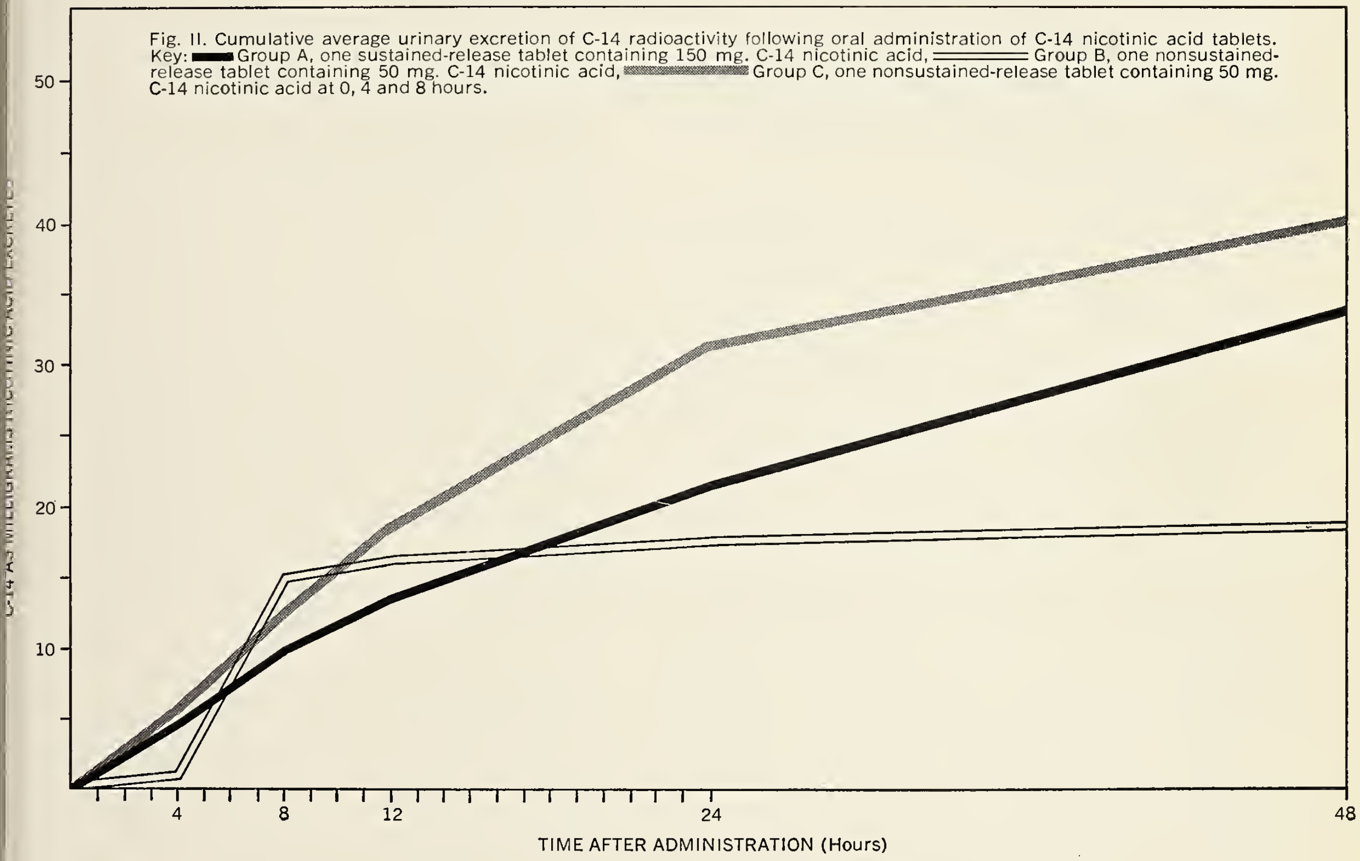


Fig. II. Cumulative average urinary excretion of C-14 radioactivity following oral administration of C-14 nicotinic acid tablets. Key: ▬ Group A, one sustained-release tablet containing 150 mg. C-14 nicotinic acid, ═ Group B, one nonsustained-release tablet containing 50 mg. C-14 nicotinic acid, ▨ Group C, one nonsustained-release tablet containing 50 mg. C-14 nicotinic acid at 0, 4 and 8 hours.

less confused and moody. Personal care, memory, emotional stability, social attention improve. Fatigue, apathy and irritability are reduced.

A prescription for 100 tablets of Geroniazol TT will permit your patients to enjoy the benefits of time-prolonged nicotinic acid/pentylenetetrazol therapy, at an economical price. Dosage is only one tablet every 12 hours.

Contraindications: There are no known contraindications.

Precautions: Exercise caution when treating patients with a low convulsive threshold.

Side Effects: Side effects are rarely encountered, however due to the vasodilatation effect of nicotinic acid, transitory mild nausea, flushing, tingling and pruritus are possible.

Dosage: One tablet every 12 hours.

Supplied: Prescribe bottles of 100 tablets, to take advantage of recent price reduction.

References: 1. Report by Nuclear Science & Engineering Corp., Pittsburgh, Pa., in files of Philips Roxane Laboratories. 2. Connolly, R.: W. Virginia Med. J. *56*:263 (Aug.) 1960. 3. Curran, T. R., and Phelps, D. K.: Am. Pract. & Digest Treat. *11*:617 (July) 1960.

"First with the Retro-Steroids"
PHILIPS ROXANE LABORATORIES
Division of Philips Roxane, Inc., Columbus, Ohio
A Subsidiary of Philips Electronics and
Pharmaceutical Industries Corp.

Geroniazol® TT

nicotinic acid 150 mg., pentylenetetrazol 300 mg.
Tempotrol® Time Controlled Tablet

Johnson Proposes Social Security Changes

Michigan physicians will be interested in the many ramifications of the changes proposed now by President Johnson. These proposals were spelled out by President Johnson in his "Message on Older Americans" sent to Congress at the start of this current session.

Following are the proposed changes:

1. An across-the-board benefit increase, raising benefit costs about 20 percent. About 20.5 million recipients — young and old — would receive *at least* a 15 percent increase.

2. An increase in the minimum benefit from $44 to $70 for a single person and from $66 to $105 for a married couple. About 2.5 million persons would receive an increase under this change.

3. A special minimum benefit based on the number of years of coverage. For example, a single worker with 25 or more years of coverage would get a benefit of $100 a month; a retired couple would get $150 a month. Those with fewer years of coverage — such as 24 or 23 years — would not receive as large a relative increase.

4. Increased benefits for those of advanced age. In 1965, Congress lowered the "quarters of coverage" required for benefit eligibility so that persons of advanced age — those 72 and over — could qualify for payments. Under this provision, benefits of $35 a month are payable to single workers and widows; retired couples get $52.50 a month.

In 1966, Congress eased the conditions of eligibility further so that another group, 72 years of age and over, never covered by Social Security, could qualify for benefits of $35 a month.

The President proposes to raise the special minimum payment from $35 to $50 a month for an individual, and for a retired couple from $52.50 to $75.

5. Liberalize the conditions of eligibility for survivor benefits so that about 70,000 disabled widows under age 62 can qualify for benefits.

6. Liberalize the work test. Under present law, a beneficiary can have job earnings of $1500 a year and receive all his benefits. For pay in excess of $1500 and up to $2700 a year, $1 in benefits is withheld for every $2 of earnings. For those making over $2700 a year, withholding is dollar for dollar.

The President proposes to raise the annual exempt amount from $1500 to $1680 a year. For earnings between $1680 and $2880, $1 in benefits would be held for every $2 of earnings. For earnings above that amount, withholding would b dollar for dollar.

The monthly earnings test would be raise from $125 to $140 a month.

7. Extension of Social Security coverage. Coverage would be extended to some 500,000 farm workers, and to federal civilian government employee through a "transfer of credits" arrangement. Thi proposal on federal employees is not a direc coverage arrangement. Rather, it is a proposal t have Social Security plug certain "gaps" that exis in the retirement, survivor and disability protection under the Civil Service Retirement Program.

8. Medicare. Payment for hospital and related services would be extended to the 1.5 million totally and permanently disabled Social Security and Railroad Retirement recipients under the age of 65.

FINANCING

Most of the proposed changes would be financed by an increase in the amount of earnings taxed by Social Security, and by higher tax rates on workers and business. These increases would become effective over a seven-year period.

The present Social Security taxable wage base of $6600 would be raised in three steps: to $7800 in 1968; to $9000 in 1971; and to $10,800 in 1974.

Social Security tax rates would be increased over a 4-year period by ¼ of 1 percent on *each* employee and employer. Beginning in 1969, the tax rate on each employee and employer would rise from 4.9 percent (including Medicare) to 5.0 percent on the first $7800 of earnings. In 1973, the tax rate on each would be increased from 5.4 percent to 5.55 percent in the first $9000 of earnings. Between now and 1974 the maximum tax would jump from $290 to $600.

TAX COSTS

In 1968, as a result of increase in the taxable wage base from $6600 to $7800, taxes on employees, employers and the self-employed would increase about $1.2 billion. Taxes would be increased in 1969, 1971, 1973 and 1974 to pay for the President's proposals.

The estimated first-year cost of the increased benefits for those of advanced age is about $240 million. About 90 percent of these costs would come from the general funds of the Treasury. The remaining $25 million would come from payroll taxes.

(Editor's Note: The source for this material is the Chamber of Commerce of the United States.)

Speaking of Malpractice Insurance....

Have you checked the advantages of insuring with Shelby Mutual Insurance Company? This plan is sponsored by Michigan Association of the Professions and is available to members of the Michigan State Medical Society.

Here is why it might be beneficial for you to investigate

* Very Broad Coverage

* Competitive Premiums as Shown Below

Limits	Class 1	Class 2	Class 3	Class 4	Premises Minimum Premium
100/300,000	$97.00	$122.00	$234.00	$349.00	$27.00

(Premises Coverage Required with Professional Liability)

Class 1 — PHYSICIANS — No surgery.

Class 2 — PHYSICIANS — Minor surgery or assisting in major surgery on own patients.

Class 3 — SURGEONS — General practitioners who perform major surgery or assist in major surgery on other than own patients.

Class 4 — SURGEONS — Specialists.

Write for complete information as to coverage and premiums.

ADMINISTRATOR
MICHIGAN ASSOCIATION
OF THE PROFESSIONS
INSURANCE PLANS

This plan underwritten by
Shelby Mutual Insurance Company, Shelby, Ohio

Ben P. Stratton Agency, Inc.
P.O. Box 547
Lansing, Michigan 48903

TABLETS

Equagesic®

(meprobamate and ethoheptazine citrate with aspirin)

Precautions: Keep out of reach of children. Carefully supervise dose and amounts prescribed, especially for patients prone to overdose themselves. Excessive prolonged use of meprobamate may result in dependence or habituation in susceptible persons—as ex-addicts, alcoholics, severe psychoneurotics. Withdraw gradually after prolonged high dosage to avoid possibly severe withdrawal reactions including epileptiform seizures. Warn patients of possible reduced alcohol tolerance. If drowsiness, ataxia or visual disturbances occur, reduce dose. If symptoms persist, caution patients against operating machinery or driving. Give cautiously to patients with suicidal tendencies. Treat attempted suicide with immediate gastric lavage and appropriate supportive therapy

Side Effects: Ethoheptazine and aspirin may occasionally cause nausea, vomiting, epigastric distress, and rarely dizziness and CNS depression. Overdosage may result in salicylate intoxication. Meprobamate rarely causes allergic or idiosyncratic reactions. These reactions, sometimes severe, can develop in patients receiving only 1 to 4 doses who have had no previous contact with meprobamate. Mild reactions are characterized by urticarial or erythematous maculopapular rash. Acute nonthrombocytopenic purpura with petechiae, ecchymoses, peripheral edema and fever have been reported. Meprobamate should be stopped and not reinstituted. Severe reactions, observed very rarely, include angioedema, bronchial spasms, fever, fainting spells, hypotensive crises (1 fatal case), anaphylaxis, stomatitis and proctitis (1 case) and hyperthermia. A few cases of leukopenia, usually transient, have been reported following prolonged dosage. Rarely, cases of aplastic anemia (1 fatal case), thrombocytopenic purpura, agranulocytosis, and hemolytic anemia have been reported; almost always, in the presence of known toxic agents.

Contraindications: History of sensitivity or severe intolerance to aspirin or meprobamate.

Composition: 150 mg. meprobamate, 75 mg. ethoheptazine citrate and 250 mg. aspirin per tablet.

Wyeth Laboratories **Philadelphia, Pa.**

Weighing on his mind, too

When pain evokes anxiety and tension, thereby heightening patient discomfort, a simple analgesic may only touch on part of the problem.

This single-prescription, nonnarcotic product, however, usually provides effective analgesia *and* helps put the patient's mind at ease.

Sees Rising Demands For Health Coverage

Aware of scientific progress and available health services the consumer will not wait passively for something to be offered in the field of comprehensive health insurance or prepayment protection.

That evaluation of consumer interests today was made by Professor Lawrence A. Hill, Ann Arbor, at the recent AMA First National Congress on Socio-Economics of Health Care in Chicago.

"The consumer is increasingly and rapidly becoming aware of what he wants. He has, through collective bargaining, and through the financial strength of group purchases of coverage, the mechanism and the muscle with which to get it," said Professor Hill of the University of Michigan program in hospital administration.

PEOPLE ARE DEMANDING coverage for all of an illness, Professor Hill said. "People are becoming dissatisfied with just certain-part coverage – they would like to be able to buy a package that would take care of anything that happens."

Professor Hill continued:

"Government, too, as the purchasing agent for Medicare and other government programs, represents another consumer voice and demand. Through its role as intermediary, private insurance has accepted a serious obligation to provide and demonstrate efficiency, economy and equality.

"As a greater and greater percentage of the tax dollar is spent by government in purchasing health care, the question 'Is purchasing from the private sector the most efficient use of those dollars?' will inevitably be asked.

"The private economy of this country has produced the highest standard of living in the world. It has been responsible to demand and perhaps somewhat ahead of demand in some cases.

"THE HEALTH SECTOR, however, has lagged behind demand in some areas. It can no longer do so. The demand is here."

The University of Michigan expert observed that the financing of health services is now a highly complex activity demanding the full time of professionals in that field.

"The notion that physicians or hospital administrators, in a three-day convention, can lay down inviolable policies for financing care is no longer tolerable," he added.

"COCA-COLA" AND "COKE" ARE REGISTERED TRADE-MARKS WHICH IDENTIFY ONLY THE PRODUCT OF THE COCA-COLA COMPANY.

Coke
TRADE-MARK
Coca-Cola
For the taste you never get tired of.

elps Finance Measles Vaccine

A check for $74,000 has been presented by the troit United Foundation to cover the deficit in e fall Metropolitan "End Measles Sunday" proj- , conducted with the MD leadership of the ayne, Oakland and Macomb county medical ieties.

The tri-county physicians have been praised for eir active participation in the one-day anti- easles drive immunizing 164,000 children.

MA Plans Symposia or Atlantic City

Many of the Michigan physicians going to the ne AMA Convention will be interested especial- in the fine symposia that are planned.

The Convention will be held in Atlantic City ne 18-22, the Scientific Program in Convention ll and surrounding hotels, and the House of elegates at the Chalfonte-Haddon Hall Hotel.

A Symposium on Absorption and Storage of on will be presented at a joint meeting of the ctions on Pathology and Physiology, Internal edicine, Experimental Medicine and Thera- utics, and Gastroenterology.

The Sections on Radiology, Proctology, Pediatrics, General Surgery, Internal Medicine, and Gastroenterology will join for a Symposium on Granulomatous Colitis and Ulcerative Colitis in Children.

Specialty societies joining AMA Sections will include:

The American College of Chest Physicians, which will join the Section on Diseases of the Chest for a program.

The American College of Cardiology, which will join the Section on Internal Medicine in a session.

The Society for Investigative Dermatology, Inc., which will hold its meetings in conjunction with the Section on Dermatology.

Other symposia also are planned.

ASK VIEWS RE MD DRAFT

Members of the American Medical Association, medical societies and other professional organizations have been asked to send their constructive comments and suggestions concerning the operation of the doctor draft to the AMA Committee studying the conscription of physicians.

Material should be sent to the Chairman, Draft Study Committee, Dept. of Governmental Medical Programs, AMA, 353 N. Dearborn, Chicago 60610.

★

Specialized Service

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MEDICAL PROTECTIVE COMPANY

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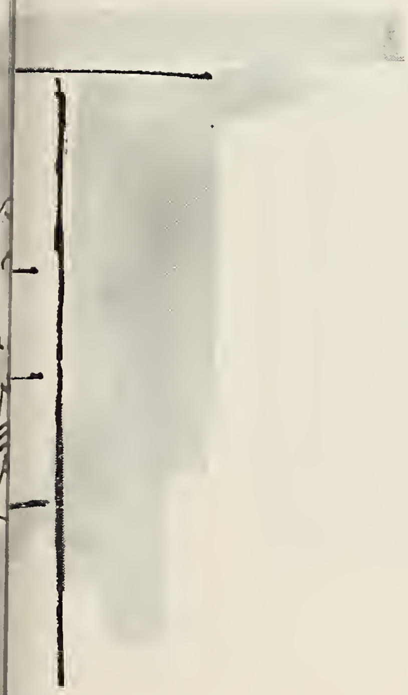


Wait, Annabelle. Mommy hasn't told the doctor yet that you *need* a shot.

be she does, maybe she sn't. But if her problem is al congestion due to cold allergy, consider the medi- on that combines conve- nce and effectiveness— ahistine Melet.

elet is especially suitable ne treatment of children. It's leasant tasting, chewable et that leaves no aftertaste gritty, undissolved particles in the mouth. It provides decongestant action almost as quickly as a liquid, but assures the accurate dosage of a tablet.

Because Melets are so convenient to carry and so easy to take at any time, adults, too, will appreciate this modern dosage form.

Use cautiously in individuals with severe hypertension, diabetes mellitus, hyperthyroidism or urinary retention. Caution adults who operate machinery or motor vehicles that drowsiness may occur. Each Melet contains phenylephrine hydrochloride 10 mg. and chlorpheniramine maleate 2 mg.

NOVAHISTINE®
MELET

DOW **PITMAN-MOORE** Division of The Dow Chemical Company, Indianapolis

Opinion Tells Procedures If Patient Discharges Physicians

(The following opinion was presented to the MSMS Council by MSMS Legal Counsel to a question raised by a county medical society secretary)

Dear Doctor,

I have your recent inquiry regarding the procedure to be followed when a patient chooses to summarily discharge his physician.

It must be recognized at the outset that a patient who is mentally and legally competent has the unqualified right to discharge his physician at any time. When a patient summarily discharges his physician during the course of continuing care, whether hospitalized or not, the physician should whenever practicable get the discharge in writing (particularly when another physician is not simultaneously engaged) and if this is not possible should have witnesses to what is said in order to protect against a subsequent claim of abandonment.

Ordinarily the patient will engage another physician promptly when discharging the first and when this is done, no particular problem is usually presented. When, however, a patient who is in need of continuing care discharges his physician without engaging another, the discharged physician should take particular care to warn him and his family of the consequences and should likewise do so in writing or in the presence of witnesses and keep a full record of so doing.

When a patient who is mentally or legally incompetent to act for himself or to act rationally attempts to discharge his physician, the physician should contact the patient's family or personal representatives and follow the same procedure with respect to warnings and records.

When a physician is discharged while the patient is hospitalized and another physician is engaged to take over, the discharged physician should follow the same general procedure with respect to records and in addition should record the facts on the patient's chart and cancel any outstanding orders. In this situation the discharged physician should make sure that the succeeding physician is informed of his cancellation orders so that there is no interval during which the patient is without care.

In the case in which the hospitalized patient attempts to discharge his physician without engaging another, very troublesome questions can arise. It must then be explained to the patient and to his family or personal representative that he cannot be medically cared for in the hospital except by a physician and that the hospital cannot assume responsibility for his medical care. If the discharged physician is of the opinion that the patient may safely be discharged from the hospital, he may do so. If not, the hospital may, in most cases, act upon a "discharge against advice" signed by the patient or his representative. Beyond this, common sense and humanitarian considerations must be the sole guidelines. Although such situations would likely be rare, it is conceivable that a hospitalized patient might discharge his physician, refuse to engage another and refuse to leave the hospital although in dire need of medical attention. In such an event I believe the humanitarian rules applicable to emergencies would prevail and that emergency care could and should be rendered by residents or staff physicians until the patient could be safely removed.

In all such extraordinary cases extreme care should be exercised to make sure that the patient and his family or personal representative are fully advised and warned and that the record is full and complete.

I am sure that you will realize that my answer to your inquiry must, of necessity, be generalized but if you have more specific questions, I shall be happy to attempt to enlarge upon my answers.

Lester P. Dodd
Legal Counsel

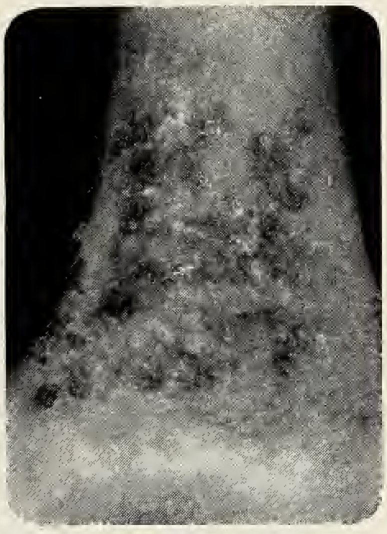
Test Your Medical Ethics

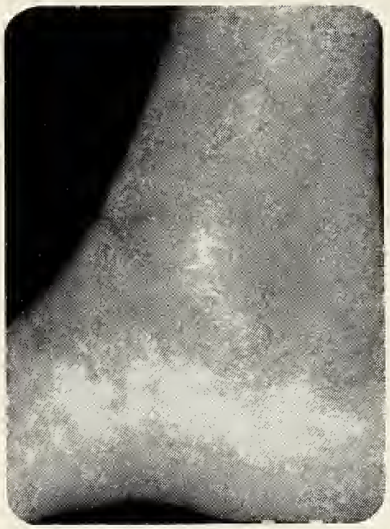
(The following answer is the opinion of the Judicial Council of the AMA)

Question: Is it ethical for a physician to indicate on his letter or billhead, or his professional cards, that he is a member or fellow or diplomate of some specialty organization within the medical profession?

ANSWER: The physician should limit the use of statements of qualifications and honors on letter and billheads and professional cards to the simple, dignified abbreviation, "M.D." or the statement "Doctor of Medicine." To do more smacks of self-laudation, borders on solicitation of patients, and tends to reduce the degree and title "Doctor of Medicine" to secondary importance. While it cannot be concluded that it is unethical to use specialty designations in this manner, it can be said that the practice is not in the best of taste or in the best interest of the profession.

Eczema of many years... controlled in two weeks


Before treatment


After treatment —
with ARISTOCORT Topical
Ointment 0.1% for two weeks

ARISTOCORT® Triamcinolone Acetonide Topicals have proved exceptionally effective in the control of various forms of eczema: allergic, atopic, nummular, psoriatic, and mycotic.

In most cases responsive to topical ARISTOCORT, the 0.1% concentration is sufficiently potent. The 0.5% concentration provides enhanced topical activity for patients requiring additional potency for proper relief.

Administration and Dosage: Apply sparingly to the affected area 3 or 4 times daily. Some cases of psoriasis may be more effectively treated if the 0.1% Cream or Ointment is applied under an occlusive dressing.

Contraindications: Tuberculosis of the skin, herpes simplex, chicken pox and vaccinia.

Precautions and Side Effects: Do not use in the eyes or in the ear (if drum is perforated). A few individuals react unfavorably under certain conditions. If side effects are encountered, the drug should be discontinued and appropriate measures taken. Use on infected areas should be attended with caution and observation, bearing in mind the potential spreading of infection and the advisability of discontinuing therapy and/or initiating antibacterial measures. Generalized dermatological conditions may require systemic corticosteroid therapy. Steroid therapy, although responsible for remissions of dermatoses, especially of allergic origin cannot be expected to prevent recurrence. The use over extensive body areas, with or without occlusive nonpermeable dressings, may result in systemic absorption. Appropriate precautions should be taken. When occlusive nonpermeable dressings are used, miliaria, folliculitis and pyodermas will sometimes develop. Localized atrophy and striae have been reported with the use of steroids by the occlusive technique. When occlusive nonpermeable dressings are used, the physician should be aware of the hazards of suffocation and flammability. The safety of use on pregnant patients has not been firmly established. Thus, do not use in large amounts or for long periods of time on pregnant patients.

Available in 5 Gm. and 15 Gm. tubes and ½ lb. jars.

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Aristocort® Topical Ointment 0.1% and Cream 0.1%, 0.5%
Triamcinolone Acetonide
Also available in foam form.

Lederle LEDERLE LABORATORIES, A Division of American Cyanamid Company, Pearl River, New York

406-6

AMA Judicial Council Issues Bank Card Tips

The opinion of the AMA Judicial Council regarding bank cards is of interest to MSMS members.

The AMA Council has decided that neither endorsement nor disapproval should be given to the bank card system at this time.

The Council also has developed some guidelines for both the county medical society and the individual physician.

The Judicial Council recommends the following principles to be implemented and applied as necessary by the county medical society for the guidance of physicians as these programs develop.

1. The county medical society should be satisfied as to the financial and professional integrity of the plan. It should negotiate with the plan sponsors to insure that service charges to the physician are reasonable. It should insist that the plan be open to all physicians on the same terms and that it not exploit or capitalize on physicians' participation in the plan. It should advise the plan that the listing of physicians in directories of participating members is contrary to the ethics of the medical profession.

2. The individual physician may not, because of his participation, increase his fee for medical service rendered the patient. He may not use the plan to solicit patients. He may not encourage patients to use the plan. His position must be that he accept the plan as a convenience to patients who desire to use it. Plaques or other devices indicating participation in the plan within the physician's office shall be kept to a discreet and dignified minimum. Plaques, signs, or other devices indicating such participation visible outside the physician's office are unacceptable.

3. The use of a bank card in connection with the payment of larger fees — which might normally be paid to the physician in installments — is not to be encouraged. All members of the Association are expected to continue the traditional practice of permitting patients of limited means to pay relatively large fees in installments without interest or carrying charges. Out of respect for the dignity and traditions of the medical profession, the physician may not relieve himself of his obligations "to render service to humanity, reward or financial gain being a subordinate consideration."

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for

- EMPHYSEMA
- ASTHMA
- CHRONIC BRONCHITIS
- BRONCHIECTASIS

The fast-disintegrating uncoated tablet gives relief in 15 minutes

Each tablet contains:

Potassium Iodide	195 mg.
Aminophylline	130 mg.
Phenobarbital, Caution: May be habit forming	21 mg.
Ephedrine HCl	16 mg.

FEDERAL LAW PROHIBITS DISPENSING WITHOUT PRESCRIPTION

Precautions: Usual for aminophylline-ephedrine-phenobarbital. Iodides may cause nausea, long use may cause goiter. Discontinue if symptoms of iodism develop.

Iodide contraindications: tuberculosis, pregnancy.

DOSAGE

One tablet, with full glass of water, 3 or 4 times daily.

Dispensed in bottles of 100 and 1000 tablets.

MUDRANE GG—Formula, dosage and package identical to Mudrane—*except*—100 mg. glyceryl guaiacolate replaces the potassium iodide. The value of Mudrane cannot be enjoyed by a small group in which K.I. is contraindicated. Mudrane GG is prepared for this group.

MUDRANE GG ELIXIR—Four 5 cc teaspoonfuls is equivalent to one Mudrane GG tablet. Dosage adjusted to age and weight of child. Mudrane GG Elixir is for pediatric patients and those who think they cannot swallow tablets. Dispensed in pint and half gallon bottles.

WM. P. POYTHRESS & CO., INC.
RICHMOND, VIRGINIA 23217
Manufacturers of ethical pharmaceuticals since 1856

Ad Man Offers "Germs of Wisdom" To the Doctors

(The following is excerpted from an address by Ernest A. Jones, President, MacManus, John & Adams, advertising firm, before the Oakland County Medical Society at its January meeting. The speech was entitled "An Ad Man Examines the Doctor, or Some Germs of Wisdom from Medicine Avenue.")

A symptom of our dehumanized and complex society is concern with our image. My subject tonight is the almost neurotic concern of the medical profession with its so-called public image — the apparent dichotomy between trying to do your job and trying to be loved.

Advertising people also are intensely concerned with their public image. Our trade publications, too, are crowded with speeches and articles on the assumed fact that the public does not love us as well as we know we deserve to be loved.

We both are extremely image-oriented. We have somehow or other confused love with respect, and equated affection with ability. This is a mistake, professionally and personally. Image-anxiety can detour us from our professional goal which should be respect — not love.

UNDOUBTEDLY THERE exists a communication failure today between patient and doctor. Is it your fault? The patient's fault?

In the case of the doctor and his patient, it may be that both are at fault, for a reason perhaps you have not thought of. The doctor may be measuring his actions, and the patient may be measuring his expectations against a golden legend of medical practice and patient care which never existed. In other words the image is being reflected in a false mirror.

Deeply embedded in American folklore is the myth of the old doctor, the haggard man seated at the child's bedside, waiting for the climax. Certainly that old-time doctor was haggard and worn as he waited helplessly for the balance of life to tip one way or the other. He knew there was nothing he could do, almost, beyond the point of relieving pain. He knew, if his patients did not, that he could expect a 20 percent mortality among all patients, and that mortality among his elder patients was almost complete.

Today's physician, pointing a magic needle at the patient's posterior, brings swift relief followed, of course, by swift bills. Scientific precision has obscured personality, but the patient, while accepting eagerly the miracles of modern medicine, still wants his hand held in an 1890 setting.

IS THE PATIENT demanding from the doctor the spiritual solace which he can no longer get from his minister, the understanding companionship he can no longer get from his family?

A good product is the only image that matters. I submit that today's man of medicine is a good man with a good product, and the only image that matters is your image with your individual patients, not your image with patients generally. And here we have a strange ambivalence — every patient seems to swear by his own doctor — and swear at doctors generally.

Lasting relationships between doctors and patients are difficult in these days of specialization and patient mobility. When 20 percent of our families move to a new community each year, lasting relationships are difficult in any circumstance.

As to specialization — the car owner does not resent the fact that in dealing with such a simple mechanism as the automobile transmission men no longer change tires, and brake specialists are unable to locate the battery. Yet that same man feels resentment when his most precious possession, his body, is referred to a specialist.

WHEN THE PATIENT takes his seat across from his doctor, it would be nice if he could see a friend across the desk. But whether or not he sees a friend, I wish he would see his doctor as a highly skilled man carrying a terrible burden; a man who, according to AMA figures, works a 60 to 70-hour week, sees 31 patients a day and receives 14 phone calls.

I hope this patient will see a man who has mortgaged many years of his life in college, med school, internship, residency, years of economic starvation and a medieval apprenticeship at a

Continued on Page 403

new from Ames
5 basic uro-analytical
facts in 30 seconds

Labstix®
BRAND REAGENT STRIPS

...broadest urine screening possible from a single reagent strip

Urine test results with Labstix Reagent Strips can represent significant guides to differential diagnosis or therapy in many conditions. An unexpected "positive" may enable you to detect hidden pathology—long before more recognizable symptoms become evident. Negative results, which permit you to rule out abnormalities in a broad clinical range, can serve as baseline values for reference in future examinations. The 5 colorimetric test areas encompassed on Labstix Reagent Strips are:

pH—values are read numerically in the essential range of pH 5 to pH 9.

Protein—results are read either in the "plus" system or in mg. % in amounts approximating "trace," 30, 100, 300, and over 1000 mg. %.

Glucose—provides a "Yes-or-No" answer for urine "sugar spill."

Ketones—detects ketone bodies in urine—**both** acetoacetic acid and acetone. Reacts with as little as 5 to 10 mg. % of acetoacetic acid.

Occult Blood—specific test for intact red cells, hemoglobin or myoglobin. Results are read as negative, small, moderate or large amounts.

Now a Clear Reagent Strip of Firm Construction

...facilitates handling during testing procedure. Excellent color contrast made possible by the clear plastic strip, together with the clearly defined color charts provided, permits precise, reproducible colorimetric readings in all 5 test areas. A more definitive interpretation of uro-analytical facts is made possible.

Available: Labstix Reagent Strips, bottles of 100 (color charts are supplied with each bottle).

Ames Company, Inc., Elkhart, Indiana AMES

08165

AD MAN OFFERS/Continued

ost of about $70,000 in real as against potential earnings.

That is the image of the doctor I would like to get across to the public.

LET US DISSECT a typical patient of yours and a customer of mine. By the time he has left his teens he has been subjected to and survived more frustration, disillusionment and spiritual mayhem than his ancestors experienced in their lifetimes. Compared to his ancestors this man of ours is rootless, geographically and spiritually. He works quite likely at an occupation which did not exist in his father's day, and lives in a suburb which was a cornfield ten years ago. Every two or three years he moves to another former cornfield.

He has more money per capita than any other people in history except the oil-drenched inhabitants of Kuwait. But this is money without mirth, affluence without fun, success without security.

Surrounded by air unfit to breathe, water unfit to drink, and a nuclear future unfit to comtemplate, he worries about calories and cholesterol.

There is your patient and my customer. There, too, I am afraid, are you and I.

I HAVE NOT TRIED to sell advertising tonight — either as a philosophy or a commodity, and yet, come to think of it, perhaps we have been talking about advertising all along — in its truest sense — the understanding of people and the establishment of a meaningful relationship with them.

If I have been in the least hopeful, consider my efforts but a token payment on the debt of gratitude I personally owe your profession — and my respect and appreciation of your dedication.

SMOKING-HEALTH TOPIC FOR DELTA TV PROGRAM

Delta College's educational TV station, WUCM-TV, channel 19, is one of 20 ETV stations in the nation awarded $500 by the Educational TV Stations Program Service to stimulate original programs on the problem of smoking.

WUCM-TV aims to arouse public concern with the problem of smoking in relation to health. The action taken by dedicated persons and organizations in various communities to enact educational programs to curtail this serious health problem will be featured in the series.

Explain Procedure When Bills Unusual for Medicare And Medicaid Patients

Whenever Michigan physicians encounter unusual circumstances in caring for patients under Medicare and Medicaid they should send additional or substantiating information at the time of billing.

The Michigan Medical Service, while serving as a channel between physicians of the state and the Social Security Administration, has responsibilities to the federal government which have been imposed by Public Law 89-97 — Medicare and Medicaid on all fiscal carriers.

One of these responsibilities will affect the practicing physician in his determination of reasonable charges, based on the individual physician's customary charge and the prevailing charges for similar services rendered by other physicians in the area.

Most important to physicians and their patients is the fact that unusual circumstances will be considered in determining reasonable charges. As an example, more of the physician's time than usual may be spent in caring for a patient, for complications, and for travel. Unless this information accompanies the claim when submitted, regardless of whether it is by assignment or direct billing, these charges may be reduced to conform with the customary or prevailing level of charges when the total amount might be allowed if this information were known.

AMA-ERF Helps Many Students

The AMA-ERF loan guarantee program has extended an average of over 7,000 bank loans a year, since its inception in 1962, to medical students, interns and residents. These young men and women are able to borrow up to $1,500 a year through this program to help meet essential training and living expenses.

Loans are repaid after all full-time training is completed. During training, interest accrues at a simple interest rate of 6%. During repayment, which may be spread over a maximum ten-year period, simple interest is applied to the declining principal balance monthly at a 7% per annum rate.

MDPH Conducts Globulin Research

A three-year research project, supported by the National Heart Institute, is underway in the Michigan Department of Public Health Bureau of Laboratories to develop a purified anti-hemophilic globulin from animal blood.

Currently, the project team has isolated AHG from cow's blood, but the problem is to achieve a further purification and a practical method of producing the blood factor on a large scale.

The major effort of the research team at present is to try to reduce the antigenicity of the animal AHG by preparing a highly-purified product. The major shortcoming of animal AHG, now used in England and other countries, is the fact that it can only be used for a very limited treatment period before resulting in a protein antibody response.

The state researchers say that, "If the extraneous antigens can be removed, or if the animal protein molecules can be altered to reduce the response, the animal AHG could be used in treating a hemophiliac, much as human AHG is being used today."

The impetus for the project comes from the fact that existing human blood supplies are being depleted because of an increase in the treatment of hemophilia, open heart surgery, and other therapeutic uses of fresh human blood. Although there are only some 1,400 known cases of hemophilia in Michigan today, statistics on human blood usage indicate that hemophiliacs use about 10 per cent of all blood drawn.

Blue Shield Covers Half of Michigan

More than half of Michigan population are members of th Michigan Blue Shield medical insurance program, a total of 4,125,000 members, reports John C. McCabe, Blue Cross president.

During 1966 the program pai an estimated $125 million to subscribers of medical care, more tha any other of 75 Blue Shield plan in the nation.

"During the year," Mr. McCab points out, "Michigan Blue Shiel became the fiscal intermediary fo the Medicare physician-care program and was also named to administer the state Medicaid program. With its regular and governmental business, Blue Shiel now processes medical services payments for about 5 million Michigan residents."

BRIGHTON HOSPITAL

A non-profit foundation

FOR ALCOHOLISM

Member, Michigan Hospital Association

A facility designed to rehabilitate and aid the compulsive drinker in arresting his addiction.

Brighton Hospital meets the standards established by the Michigan State Board of Alcoholism and is recommended by that Board.

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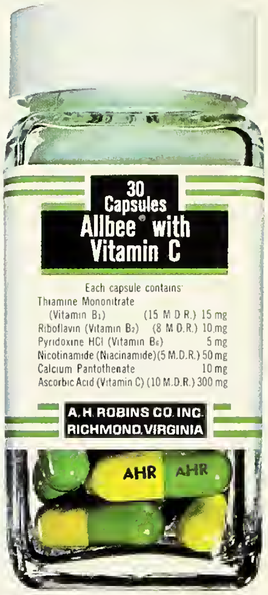
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in memoriam

octor Sheldon nspired Many

Services were held February 14 at Ann Arbor r John M. Sheldon, M.D., director of the de- rtment of postgraduate medicine and chief of e allergy service at the University of Michigan edical Center, who died February 12 in Uni- rsity Hospital. He was 61.

He was one of the three physicians in the hos- tal's 100-year history to rise from intern to a ember of the board in control.

Despite a long illness Doctor Sheldon had re- ained active in a wide variety of professional airs.

At the time of his death he was on the hospital ard, a member of the House of Delegates of the nerican Medical Association (representing the nerican Academy of Allergy), director of U-M's ontgomery Allergy Research Laboratory, a gov- nor of the Michigan Medical Center Alumni ciety, and immediate past president of the ashtenaw County Medical Society.

As director of the department of postgraduate edicine, Doctor Sheldon was in contact with re than 2,000 Michigan physicians each year. e formerly was chairman of the MSMS Com- ittee on Postgraduate Medicine. He was also cognized as one of America's prominent aller- ts, having specialized in that field since 1932.

Dean William N. Hubbard, Jr., M.D., of the edical School said: "The distinguished career of hn M. Sheldon was a day-by-day testimonial to idents and colleagues alike of the highest ideals the medical profession. In this day when one ars much about the narrowness of specialists d the movement of the patient away from the nter of the physician's interests, Doctor Sheldon presented the great traditions of medicine. His icitude for his patients, his dedication to schol- y work, the enthusiasm with which he taught, d the generosity with which he gave his good dgment and leadership to the profession of dicine altogether will be long remembered by students and colleagues. Through the inspira- n of this memory Doctor Sheldon's influence ll survive him."

This past January 19 Doctor Sheldon was named the Michigan Health Council's "Health Hall Fame" in recognition of his many professional ntributions.

In 1963, the Michigan State Medical Society awarded him its Certificate of Commendation for his work in medical education and allergy and, according to the citation, "as an illustrious leader in the important work of professional medicine."

And just a year ago 75 doctors, including most of those who received their specialty training from him, formed the John M. Sheldon Allergy Society in his honor.

Doctor Sheldon earned his bachelor's degree and his Doctor of Medicine degree at the University of Nebraska, and joined the University of Michigan as an intern in 1930. He remained at Michigan for his residency, then rose through the academic ranks to become a professor of internal medicine in 1950.

During World War II Doctor Sheldon joined the University of Michigan's 298th General Hospital Unit as chief of the medical service. He received three battle stars for action in Europe. In July 1945 he was promoted to colonel and made commanding officer of the unit until its deactivation in October 1945.

As part of his close involvement with professional affairs he had served as president of the American Academy of Allergy in 1954, and president of the Michigan Allergy Society.

He was a member of the American Medical Association, the American College of Physicians, the Central Society for Clinical Research, the American Foundation for Allergic Diseases and other organizations.

He was national vice president of Phi Rho Sigma.

With his colleagues in 1954 he wrote *"The Manual of Clinical Allergy,"* the second edition of which is to appear later this year.

Dr. Sheldon was born in Percival, Iowa, Nov. 2, 1905.

He is survived by his wife, Eloise, in Ann Arbor; a sister, Mrs. Cecile Bartholomew, in New York; and a brother, Will, in Percival.

Contributions in Doctor Sheldon's name are being accepted for the U-M Medical School's Allergy Special Fund.

CHARLES I. HERRINGTON, M.D.

Charles I. Herrington, M.D., 73, died January 5 at Hubbard Memorial Hospital, Bad Axe.

A graduate of Hillsdale College and Wayne University School of Medicine, Doctor Herrington began his practice in Sebewaing in 1919, moving to Bad Axe in 1920.

Doctor Herrington was affiliated with Hubbard Hospital for 48 years and served as medical di-

CONTINUED ON PAGE 409

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rector of Huron Community Health Center. He was a member of the Bad Axe Board of Education for 16 years, was a past president of the Rotary Club and an honorary member of the Verona Hills Golf Club. He was a Life Member of Verona Masonic Lodge, Bad Axe Commandery Knights Templar, and the Michigan State Medical Society. His medical fraternity was Phi Rho Sigma.

JOHN J. KURTZ, M.D.

John J. Kurtz, M.D., a Flint physician for more han half a century, died January 17 at his home. He was 79.

Born in Mt. Morris, Doctor Kurtz attended Northwestern University Medical School and began his private practice at Otisville in 1915.

In 1965 the MSMS House of Delegates granted him a 50 Year Award. The Selective Service Board n 1960 honored him for 15 years of service as a medical advisor.

Doctor Kurtz was a charter member of the Flint Exchange Club, a member of the Elks, and active n Masonic organizations.

CHARLES E. LEMMON, M.D.

Charles E. Lemmon, M.D., Grosse Pointe Farms, lied January 28 at Harper Hospital. He was 77.

A veteran of both world wars, Doctor Lemmon held the rank of lieutenant colonel. He had taught t Wayne State University since 1930 and was an ttending physician at Harper and Detroit General Hospitals.

A past president of the Detroit Academy of Medicine and the Detroit Medical Club, Doctor Lemmon was also a member of the American College of Physicians, Wayne County Medical Society, Detroit Rotary Club, and the Detroit Athletic Club. He was a Life Member of the Michigan State Medical Society, and his medical fraternity was Nu Sigma Nu.

WILLIAM L. SHERMAN, M.D.

William L. Sherman, M.D., Detroit, died January 24 in Detroit at the age of 72.

A former chairman of both the surgical section of the Wayne County Medical Society and its board of trustees, Doctor Sherman was past president of the Detroit branch of the American Urological Association.

Doctor Sherman was graduated from Detroit College of Medicine in 1917. During World War I he served in the medical corps. A urologist, he was affiliated with Providence, Jenning's, and Wayne County General Hospitals. Nu Sigma Nu was his medical fraternity.

Doctor Sherman was a Life Member of the Michigan State Medical Society.

EDWARD S. ZAWADZKI, M.D.

Edward S. Zawadzki, M.D., died February 5 in Detroit at the age of 52.

Wayne County Medical Examiner since the post was established in 1955, Doctor Zawadzki was a pathologist specializing in poisons, and at one time he served as a consultant to the United States Government on aerospace medicine.

Doctor Zawadzki was a graduate of Wayne State University School of Medicine, interned at Charity Hospital in New Orleans, and entered the United States Army Medical Corps early in World War II. After the War he served as a resident at Detroit Memorial Hospital and as medical director of Crittenton General Hospital.

A fellow of the American College of Pathologists, American Society of Clinical Pathologists, American Academy of Forensic Sciences, Doctor Zawadzki was a member of the American Chemical Society, New York Academy of Science, International Academy of Pathologists, Michigan Pathological Society, National Association for the Advancement of Science, Sigma Xi medical fraternity, Knights of Columbus, Press Club, and Polish Century.

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FOR RENT: New eight room brick office equipped and furnished. Established physician died. Ground floor, central air conditioning, private paved parking on main street across from Community Hospital. In southwestern Michigan fruit belt area near city of 30,000 with industry. Mrs. J. F. Reed, Watervliet, Mich. 49098. Phone 616-463-5540.

GENERAL PRACTICE OPPORTUNITY: in association with three established General Practitioners in a suburban city near Detroit. Hospital privileges available at three hospitals. Salary and percentage leading to partnership after one year. Contact: Thomas Ganos, M.D., 6742 Park Ave., Allen Park, Mich. 48101. Phone DUnkirk 1-5675.

AN OUTSTANDING OPPORTUNITY is available for Locum Tenens in Ohio, July 1967. General Practice in rural community with fine hospital. Excellent consultation available in all specialties. Remuneration for Locum Tenens $31,000 based on last year's receipts. Furnished office, etc. provided. Present doctor taking residency. Reply Box #5, 120 West Saginaw Street, East Lansing, Michigan.

GENERAL PRACTICE, grossing $56,000 a year, available in Ohio. Included is modern, air-conditioned building, complete equipment, drugs, records. Excellent clientele in pleasant small community with hospital. Doctor leaving to take residency. Available July 1967. Liberal terms, $23,000. Box #6, 120 West Saginaw, East Lansing, Mich.

EXCELLENT OPPORTUNITY in the City of Troy. Residential population 27,500; Industrial employment over 8,000; Business & commerce — about 3,000 employed; School enrollment 4,800. Presently there are no M.D.'s (according to telephone yellow pages). Now leasing for new doctors' building at I-75 and 16 Mile Rd. Agreements already signed with a General Surgeon, Dentist, Optometrist, Professional Pharmacist and Medical Technologist. Light, air conditioned offices will be designed to order. All conveniences including ample free parking will be provided. ANGUS McLAY, Broker — 177 W. Big Beaver, Troy, Mich. 48084. Phone (313) 689-0555.

NEW MEDICAL SUITE: Ideal location — fast growing community — 40666 Five Mile Road, bordering Plymouth-Livonia-Northville. Homes priced from $20,000-$40,000. Four examining rooms, lab, X-ray room, private office, business office, large waiting room. Ready for occupancy—March 1st. Dental clinic in same building. Drug store adjacent to clinic. Harold Priestaf, 8 Robindale Court, Dearborn, Michigan 48124. Phone: LOgan 2-3799.

GENERAL PRACTITIONER or INTERNIST urgently needed to join two man MD group. Large established practice recently vacated for health reasons. Relatively new office building, fully equipped and staffed and excellent hospital facilities. Located in fine Western Michigan community; many recreational facilities nearby. Excellent opportunity. Write P. O. Box 4, 120 West Saginaw Street, East Lansing, Mich.

NEWBERRY in need of General Practitioner and a surgeon. Population including surrounding area about 5,000. Excellent schools, churches of all denominations. Hospital opened February, 1966. An extended care Facility is being made available in former Hospital building. Newberry is a paradise for a fisherman or hunter. Contact: Administrator, Helen Newberry, Joy Hospital, Newberry, Michigan.

BOYNE CITY: General Practitioner urgently needed to serve this growing community located in the heart of Northern Lower Michigan. Excellent opportunity. Three Hospitals within close radius. For further information please contact: Dr. Richard L. Fish, Boyne City Chamber of Commerce.

FOR LEASE: Suite available in June 1967 in Dearborn Professional Building, Military at Monroe, Dearborn, Michigan. Perfect set-up for eye specialist and/or ear, nose & throat specialist. Other specialties in building. Write or Call LO 1-7919 for appointment. Joseph M. Caputo, M.D., 205 Dearborn Professional Bldg., Dearborn, Michigan

RENT OR LEASE: Space available Fisher Bldg., Detroit, two days week and evenings for qualified internist. Reply: Box 39, 120 Wes Saginaw Street, East Lansing, Mich

GENERAL PRACTICE OPPORTUNITY: in association with three established General Practitioners in a community of 6,000 ten miles from State Capitol of Lansing, Michigan Hospital privileges available at three hospitals. Salary and percentage leading to partnership. Contact: S R. Robinson, M.D., 110 W. Jefferson Grand Ledge, Michigan, Phone: 517 627-7172.

PSYCHIATRIC RESIDENCIES July 1967: Approved three-year progressive program in Metropolitan Detroit area. University associations Teaching staff of board men, psychoanalysts, professors, outstanding visiting lecturer. Active research Modern physical plant. Salary $8,352 to $9,500. Five-year career program $9,500 to $17,184. Subject to Legislative approval, this rate wil be increased to $8,978 to $10,21 and $10,232 to $13,737 as of July 1 1967. All Michigan Civil Service benefits. General practitioners completed internship four years ago may be eligible for NIMH stipends of $12,000 per year. Write: Director of Education and Research; Northville State Hospital, Northville Michigan 48167.

PSYCHIATRIC PRACTICE, take over office and lease. City of over 100,000 in central Michigan. Large excellent practice opportunity, will introduce. Available July 1967. Contact: Box 7, 120 West Saginaw Street, East Lansing, Michigan.

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TETRACYCLINES AND THE TEETH

When they were introduced, the tetracyclines seemed to have many advantages over other antibiotics: the spectrum of organisms they covered was wider; they did not seem to sensitize the patient; and other side-effects were not apparent. The wide popularity they enjoyed, however, made it clear that this too-simple picture had to be greatly modified. Patients did become sensitized and instances of anaphylactic shock, urticaria, angio neurotic edema and photosensitivity were reported. The commonest side-effects seem to be diarrhea and vomiting and discoloration of teeth in children. The staining of teeth was first noticed during the assessment of long-term antibiotic therapy in children with fibrocystic disease, when 40 out of 50 patients so treated were seen to have dark staining. Since then the administration of tetracycline has been amply confirmed as the cause of discoloration. The tetracycline molecule has an avidity for heavy metallic ions and chelates with calcium, so that any tissue undergoing mineralization when the drug has been given has not only calcium deposited in it but also the tetracycline molecule. Thus, after therapy has stopped and sufficient time has elapsed for elimination, a child's bones and teeth still show large areas where the drug has been incorporated; but in the adult areas of bone undergoing repair or remodeling, or calcifying glands will contain the drug. Bone becomes remodeled over the years and will eventually lose any deposited tetracycline; but teeth provide a permanent record of any tetracycline given during their mineralization. *The Lancet, April 23, 1966.*

FIND ASPIRIN CAUSE OF MOST INGESTION ACCIDENTS

In a report of a survey of the products most frequently named in ingestion accidents among children under five years of age, aspirin accounted for 25.8 per cent of the total cases. This finding is presented in a recent issue of the Bulletin of the National Clearinghouse for Poison Control Centers.

The other items in the 10 most frequently involved categories and the percentage of total ingestion is as follows: soaps, detergents and cleaners, 4.2 per cent; bleach, 3.6 per cent; vitamins and minerals, 3.5 per cent; insecticides, 3.2 per cent; plants, 2.4 per cent; polishes and waxes, 2.2 per cent; hormones, 2.1 per cent; tranquilizers, 2.0 per cent; and other analgesics and antipyretics, 1.9 per cent.

Items such as kerosene, disinfectants, lye and corrosives and laxatives, previously among the 10 most frequent substances, fell below this level in the most recent analysis of the data.

Tandearil®
oxyphenbutazone

Therapeutic Effects: Tandearil is a nonhormonal compound which may rapidly resolve inflammation and help restore normal joint function. Its action does not affect pituitary-adrenal function or impair immune responses. Its value in osteoarthritis is especially noteworthy because this disorder responds inconsistently to steroids and is often resistant to salicylates. Further, indomethacin is limited only to osteoarthritis of the hip, whereas oxyphenbutazone is effective in all forms of the disease.

Contraindications: Edema; danger of cardiac decompensation; history or symptoms of peptic ulcer; renal, hepatic or cardiac damage; history of drug allergy; history of blood dyscrasia. The drug should not be given when the patient is senile or when other potent drugs are given concurrently.

Warning: If coumarin-type anticoagulants are given simultaneously, watch for excessive increase in prothrombin time. Pyrazole compounds may potentiate the pharmacologic action of sulfonylurea, sulfonamide-type agents and insulin. Carefully observe patients receiving such therapy. Use with great caution in the first trimester of pregnancy.

Precautions: Obtain a detailed history and a complete physical and laboratory examination, including a blood count. The patient should be closely supervised and should be warned to report immediately fever, sore throat, or mouth lesions (symptoms of blood dyscrasia); sudden weight gain (water retention); skin reactions; black or tarry stools or other evidence of intestinal hemorrhage. Make regular blood counts. Discontinue the drug and institute countermeasures if the white count changes significantly, granulocytes decrease, or immature forms appear. Use greater care in the elderly and in hypertensives.

Adverse Reactions: The most common are nausea, edema and drug rash. The drug has been associated with peptic ulcer and may reactivate a latent peptic ulcer. Infrequently, agranulocytosis, or a generalized allergic reaction may occur and require withdrawal of medication. Stomatitis, salivary gland enlargement, vomiting, vertigo and languor may occur. Leukemia and leukemoid reactions have been reported but cannot definitely be attributed to the drug. Thrombocytopenic purpura and aplastic anemia may occur. Confusional states, agitation, headache, blurred vision, optic neuritis and transient hearing loss have been reported, as have hyperglycemia, hepatitis, jaundice, and several cases of anuria and hematuria. With long-term use, reversible thyroid hyperplasia may occur infrequently. Moderate lowering of the red cell count due to hemodilution may occur.

Dosage in Osteoarthritis: The initial daily dosage in adults is 300-600 mg. in divided daily doses. When improvement occurs, dosage should be decreased to the minimum effective level; this should not exceed 400 mg. daily, and is often achieved with only 100-200 mg. daily.

For complete details, please refer to full prescribing information. 6562-VI(B)R

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Tandearil®
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helps osteoarthritic joints move again

Please see adjoining page for brief prescribing summary.

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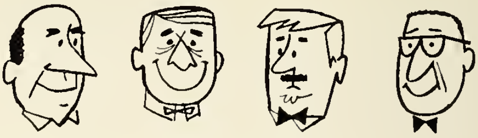
	3 out of 4 osteoarthritics completely or markedly improved
Sperling, I.L.: 3 Years' Experience with Oxyphenbutazone in the Treatment of Rheumatic Disorders, Applied Therapeutics 6:117, 1964.	76.9% of 407 patients
Watts, T.W., Jr.: Treatment of Rheumatoid Disorders with Oxyphenbutazone, Clin. Med. 73:65, 1966.	84.6% of 39 patients

about doctors



This year the Mt. Pleasant Chamber of Commerce presented its Outstanding Citizen Award to a physician, Lionel L. Davis, M.D. Honored for 30 years of medical leadership in Mt. Pleasant and Isabella County, Doctor Davis has been a key figure in founding Central Michigan Community Hospital. The MSMS House of Delegates in 1966 also recognized Doctor Davis' outstanding contributions and awarded him a Certificate of Commendation in recognition of his "distinguished career as physician and surgeon . . . and also for his dedicated leadership to provide medical facilities for his community."

The new chairman of the Michigan State University Development Fund is Arno W. Weiss, M.D., Saginaw. A graduate of MSU and WSU Medical School, Doctor Arno had served on the Fund Board for eight years.

Bernard Chodorkoff, M.D., Detroit, and his wife, Joan, a clinical psychologist, will be featured speakers at the PTA Problem Clinic, March 21, sponsored by the Michigan Congress of Parents and Teachers and the Michigan State University College of Education and Continuing Education Services. The Chodorkoffs will discuss the role parents play in the development of male and female identification of children.

Two Detroit physicians now hold key positions in the Michigan Association for Law and Psychiatry. Newly-elected president of the Association is Emanuel Tanay, M.D., and the new secretary-treasurer is Henry Krystal, M.D. Both men are associate professors of psychiatry at Wayne State University School of Medicine.

Alvin B. Rosenbloom, M.D., Detroit, is now president of the Detroit Branch of the Vanderbilt University Alumni Association for 1967.

Speaking at the spring session of the American Academy of Pediatrics in San Francisco will be Andrew D. Hunt, M.D., Dean of the College of Human Medicine at Michigan State University. "Pediatrics: the Basic Science for Medical Education?" will be his topic at the April 3-5 program.

Two MSMS members help provide leadership on the Board of Trustees of the Detroit Historical Society. They are D. T. Burton, M.D., Detroit; and Alfred H. Whitaker, M.D., Grosse Pointe.

Securities from the trust estate of the late Ralph L. Morse, M.D., Norwalk, Ohio, valued at $956,500, will be used to establish an endowment fund for needy and promising students at the University of Michigan Medical School. Although Dr. Morse died in 1943, his last beneficiary died last December, leaving the trust estate to be turned over to the University.

Warren Tryloff, MSMS Associate Executive Director, was elected treasurer of the Professional Convention Management Association at the recent meeting of the Joint Conference on Medical Conventions. Mr. Tryloff has served as a member of the PCMA Board for the past three years.

George P. Sweda, M.D., health director of Muskegon County since 1961, is now assistant to the director of the Detroit and Wayne County Health Department.

Louis E. Heideman, M.D., Detroit, has been elected chairman of the United Community Services Health Federation for 1967.

Note: See Pages 285, 358 and 381 for more "About Doctors."

and their friends

U.S. MEDICAL
MAR 28 1967

VOLUME 66, MARCH 1967, NUMBER 6 — NEWS EXTRA — DEADLINE MARCH 9

These MSMS Bills Merit Your Support

The February *Michigan Medicine* "News Extra," on pages 265-267, contained brief explanatory paragraphs covering ten bills sponsored by MSMS. At this writing seven have been actually introduced. The support of all MSMS members, through contact with their state legislators, will assist in passage of these bills:

Blood transfusion a service, not a sale: House Bill 2520, in House Taxation Committee: James Folks (R) Horton, Chairman.

Repeal of Basic Science Act: Senate Bill 229, in State Affairs Committee; *and* House Bill 2203, in House Public Health Committee.

Create a mental health commission: Senate Bill 275, in State Affairs Committee.

Create a board of public health: Senate Bill 366, in State Affairs Committee.

Provide qualifications for State Mental Health Director: House Bill 2586, in House Mental Health Committee.

Amend PKU Test Law: Senate Bill 274, in Senate Health, Social Services and Retirement Committee.

Provide immunity for hospital tissue committees: Senate Bill 339, in Senate Judiciary Committee.

Reference to the February "News Extra" will not only explain the basic provisions of these MSMS bills, but will also indicate, on pages 269-270, the members of the Senate and House Committees referred to above. Each MSMS proposal is worthy of your support and discussion with your own senators and representatives.

Numbers and assignments of the remaining MSMS bills will be listed in the April issue of *Michigan Medicine,* center section.

Offer PG Programs In 18 Communities

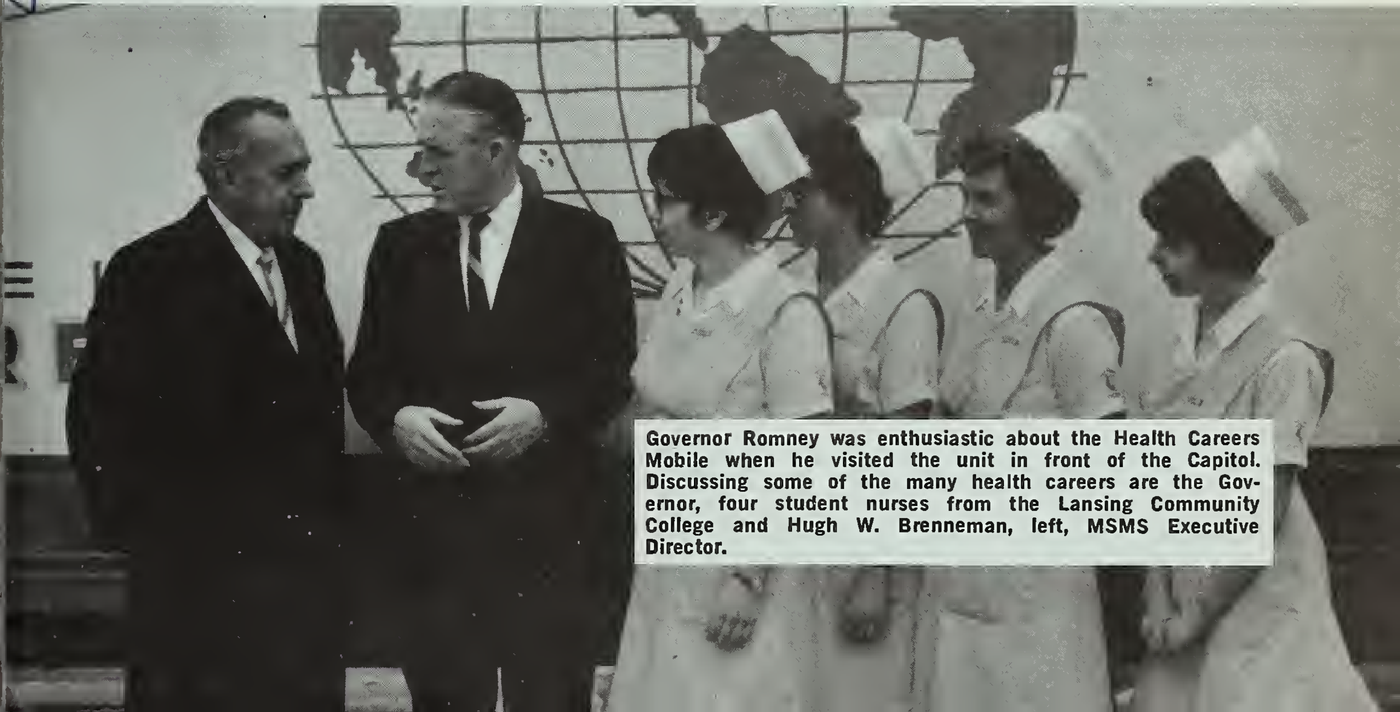
MSMS members are urged to participate in the 18 Spring Postgraduate Medical Education programs across the state during April and May. The programs will be coordinated with county medical society meetings in most cases — with the host society inviting physicians from neighboring counties to attend if they wish.

The detailed program folder will soon be mailed to MSMS members by the MSMS Postgraduate Medical Education Committee. H. A. Towsley, M.D., is Chairman of the Committee.

Following are the locations and dates:

Lower Peninsula: Alpena, April 20; Battle Creek, May 2; Cadillac, May 25; Grayling, April 27; Holland, May 5; Lansing, May 16; Midland, May 11; Muskegon, May 17; Niles, May 16; Petoskey, April 13.

Upper Peninsula: Escanaba, May 16; Houghton, May 15; Iron Mountain, May 17; Ironwood, May 16; Manistique, May 16; Marquette, May 18; Menominee, May 17; Sault Ste. Marie, May 15.



Governor Romney was enthusiastic about the Health Careers Mobile when he visited the unit in front of the Capitol. Discussing some of the many health careers are the Governor, four student nurses from the Lansing Community College and Hugh W. Brenneman, left, MSMS Executive Director.

HOSPITAL LICENSING BILL ONCE AGAIN UNDER CONSIDERATION

Senate Bill 16 and House Bill 2028 are identical proposals developed by the Michigan Hospital Association and Department of Public Health and are generally endorsed by the Michigan State Medical Society for the licensing of all Michigan hospitals.

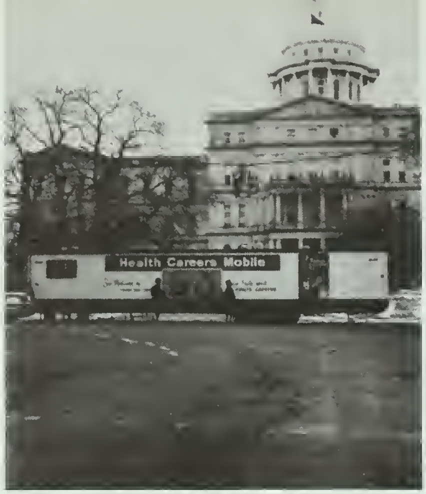
In a hearing on SB 16, held February 7, MSMS requested some clarifying amendments which were accepted by the Senate Health, Social Services, and Retirement Committee, and SB 16 has now been sent to the *Senate Appropriations* Committee for study of its fiscal implications. Concurrently, HB 2028 has been considered in the House Public Health Committee and referred to the House Appropriations Committee.

The 1967 hospital licensing bills do not contain the "franchising" concept, but are confined to issuing licenses upon the basis of meeting construction standards. The bills also clarify the responsibilities of hospital governing bodies and request the creation of a "state health facilities council" to advise and assist the Director of Public Health in administering the law.

Three other proposals (HB 2101, 2102, and 2248) also deal with hospital licensing, but have not moved in the Legislature.

MSMS has testified at length on SB 16, and following the recommendations of the Senate Committee on Health, Social Services, and Retirement, which include MSMS suggestions for amendment, the Medical Society *supports* favorable action on the bill.

Of the 1,009 bills available to MSMS as this issue goes to press, 116 have been earmarked for intensive study, and requests have been filed for the presentation of MSMS testimony on 16 of these bills. A full picture of proposed legislation will be available for publication in April.



IN FRONT OF CAPITOL

Careers Mobile Rolls; At Dearborn

Now touring the state is the Health Careers Mobile, newly-converted from the MSMS Healthmobile. The Mobile began its trek in Jackson, where it was a featured attraction of Jackson's Health Week. It next appeared in Lansing, where it was located in front of the State Capitol. Later, it travelled to Dearborn's Greenfield Village.

Aimed primarily at students, the Health Careers Mobile hopes to eliminate Michigan's manpower shortage by health career recruitment. Toward this goal, the Mobile contains a display showing Michigan locations for training in medicine, nursing, dentistry, pharmacy, physical therapy, and allied health occupations. All of Michigan's three medical schools have special exhibits, and of particular interest is a heart-lung machine furnished by the Sarns Corporation.

The Health Careers Mobile is also highlighting the Silver Anniversary Celebration of the Michigan Health Council, the Mobile's sponsoring organization.

JUNE 18-22 '67
AMA 116th ANNUAL
CONVENTION
ATLANTIC CITY

Team Doctors, Coaches To Confer May 25

Physicians who serve as tea doctors are urged to plan now t participate in the second MSM Conference on the Medical A pects of High School Sports, at th University of Michigan, Thur day, May 25.

"This year the conference pr gram will be of value to coach as well as team physicians," e plains James S. Feurig, M.D Chairman of the sponsoring MSM Committee on the Medical Aspec of Organized Athletics. Docto Feurig is Director of the Studer Health Services at MSU and tea physician for the Spartans.

The U-M Department of Pos graduate Medicine will co-sponso the May conference.

Conference details will appea in the April issue of *Michiga Medicine*. Interested physician may obtain further informatio from MSMS Headquarters.

Bill to Cut Back Medicaid Halfway Through Legislature

Senate Bill 110, passed by th Senate on February 21 and no under consideration by the Hous Appropriations Committee, will, passed, remove physicians' service other than those provided to ho pital inpatients, pharmaceutica services, and mental services fro benefits available under the Mic igan "Medicaid" program.

If Senate Bill 110 is enacte only those persons receiving cat gorical aid (OAA, ADC, AB, an AD) will be entitled to servic by a physician in his office. Elig ble persons will be limited t those receiving a money paymen such individuals are issued a identification card with the check, and a physician treatin such a person will be reimburse by MMS for his services if th person's card bears a "code 1 designation.

REGIONAL SESSIONS OF COUNTY OFFICERS ARE WELL RECEIVED

"Helps us convey to our members what is being accomplished and projected by MSMS."

"The stimulus of such a meet- ng to the grassroots should somehow be continued throughout the year."

"We greatly appreciate being aved the time and afforded the onvenience of having the meet- ng near home rather than travel to Detroit, Lansing, etc."

These are typical comments from the county society officers who are participating in a series of Monday night Regional Leadership Conferences sponsored by The Council.

MSMS staff executives and officials are presenting information and answering questions about county society and MSMS opera- ions.

Following is a complete list, with appropriate dates, of host communities: Grand Rapids, February 27; Flint, March 6; Gaylord, March 13; Lansing, March 20; Marquette, March 27; Kalamazoo, April 10; and Detroit, after May ., with the new Wayne County Medical Society officers.

McCLEAVE COMING TO MSU

Physicians and clergymen in the Central Michigan area can hear an address on "Paradoxes in Modern Medicine" by the Rev. Paul McCleave, AMA, on May 9 at 7:30 p.m. at MSU.

Rev. McCleave has been invited to give the Yates Lecture by the Michigan Tuberculosis and Respiratory Disease Association. Among the cooperating groups is the MSMS Committee on Medicine and Religion.

ADD: IN MEMORIAM

In addition to the names reported in the March "In Memoriam," the following news has reached the MSMS office. Details will follow in the April issue of *Michigan Medicine:*

John L. Hackert, M.D., Allen Park, died January 28.

George O. Knutson, M.D., Negaunee, died February 26.

Sydney S. Levine, M.D., Detroit, died February 13.

Frank Robert Menagh, M.D., Detroit, died February 12.

Alexander W. Sanders, M.D., Detroit, died February 11.

Charles Lewis Tomsu, M.D., Detroit, died February 20.

Medical News Reporters, Doctors to Meet May 12

The 1967 Annual MSMS Conference on Medical News Reporting will be held this year on Friday, May 12, at the University of Michigan, as one of the special highlights of the U-M Sesquicentennial.

The MSMS Publication Committee and the MSMS Public Relations Committee will sponsor the event for representatives of the press, radio, and television, along with physicians concerned about better communications. Several co-sponsors have been invited to join the one-day workshop.

"Medical Manpower" will be the major subject considered by the reporters, editors, and doctors. U-M Medical School Dean William N. Hubbard, Jr., M.D., will be the featured speaker.

The 1966 workshop was at MSU.

Program details will appear in the April issue of *Michigan Medicine.* Interested physicians may obtain further details from MSMS Headquarters.

JACKSON TO HOST APRIL MSMAS CONFERENCE

Jackson medical assistants are busily preparing for the Tenth Annual Educational Seminar of the Michigan State Medical Assistants Society to be held April 23 at the Hayes Motor Hotel, Jackson.

"Rx for Knowledge" is the theme of the Seminar where outstanding speakers will be featured. A highlight will be the L. Fernald Foster Lecture given by Ross V. Taylor, M.D., Jackson.

Other speakers will include Donald H. Hulding, M.D., Jackson, on "Dermadromes," and John R. G. Gosling, M.D., Ann Arbor, on "Gynecological Bleeding."

All medical assistants, both MSMAS members and non-members, are urged to attend the Seminar.

T OUT AND RETURN THIS FORM ORDER VALUABLE MATERIALS

The following material may be useful to you. Check any item ed, cut out the form, and mail it in an envelope to: Michigan Medical Society, 120 West Saginaw, East Lansing, Michigan 48823.

——— **Maternal Health Desk Reference Card Number 9, "The Management of the RH-Sensitized Patient."**

——— **Our Boom Babies Grow Up! A booklet regarding the Michigan population explosion, prepared by the Adult Education Association of Michigan.**

——— **Proceedings, 1966 AMA Session on School Health.**

——— **Smoking and Its Relationship to Health and Disease, Michigan Council on Smoking and Health Guidebook.**

(Your address already is on the back of this cut-out coupon)

VERNON B. BASS, M.D.

Bass, Anthony to Lead MDPAC; Others Named to Executive Committee

Vernon B. Bass, M.D., Saginaw, was recently elected Chairman of MDPAC, and George E. Anthony, M.D., Flint, was elected Secretary-Treasurer. Both men were also appointed to the executive committee along with Donato Sarapo, M.D., Adrian; T. R. Berglund, M.D., Kalamazoo; and W. C. C. Cole, Jr., M.D., Detroit.

In the coming year MDPAC will hold a workshop for the training of doctors in the political field; it will launch a new membership drive; it will continue PAC (Political Action Committee), an organization based in every one of the 19 congressional districts in Michigan.

Participating at the recent MDPAC Annual Meeting were George E. Anthony, M.D., left, and James Rosevier, AMPAC field representative. (Photos by R. C. Best)

PHYSICIANS URGED TO ATTEND MAP CONGRESS, APRIL 28-29

An appeal for physicians to be well represented at the Annual Congress of the Professions, April 28-29 at the Statler-Hilton Hotel Detroit, is made today.

Physicians will be keenly concerned with many aspects of the Congress' theme of "Professional Supervision, Security and Survival," states MAP Vice President G. B. Saltonstall, M.D., Charlevoix.

MAY 17 CHOSEN BY WSU FOR ALUMNI CLINIC DAY

The Wayne State University School of Medicine Alumni Association will present its 99th Annual Clinic Day and Alumni Reunion, Wednesday, May 17, in the Sheraton-Cadillac Hotel, Detroit. The day will offer seven scientific programs, the Association's annual meeting, a complimentary luncheon, and the annual banquet.

Alumni and other doctors of medicine are cordially invited to participate in the Clinic Day Program. Banquet reservations may be made by writing Alumni House, Wayne State University, Detroit, Michigan 48202.

MEDISCENE

Apr. 3—Beaumont Lecture, Wayne County Medical Society Building, Detroit

Apr. 4—Annual Membership Conference, Michigan League for Nursing, Kellogg Center, Michigan State University, East Lansing

Apr. 19—The Council, MSMS Headquarters, East Lansing

Apr. 19-21—University of Michigan Medical Center Sesquicentennial Symposium on the Prevention of Highway Injury, the University of Michigan, Ann Arbor Medical School

Apr. 26—Muskegon Trauma Day, Muskegon

MICHIGAN MEDICINE
MICHIGAN STATE MEDICAL SOCIETY
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MICHIGAN MEDICINE
MICHIGAN STATE MEDICAL SOCIETY Volume 66, Number 7 APRIL, 1967

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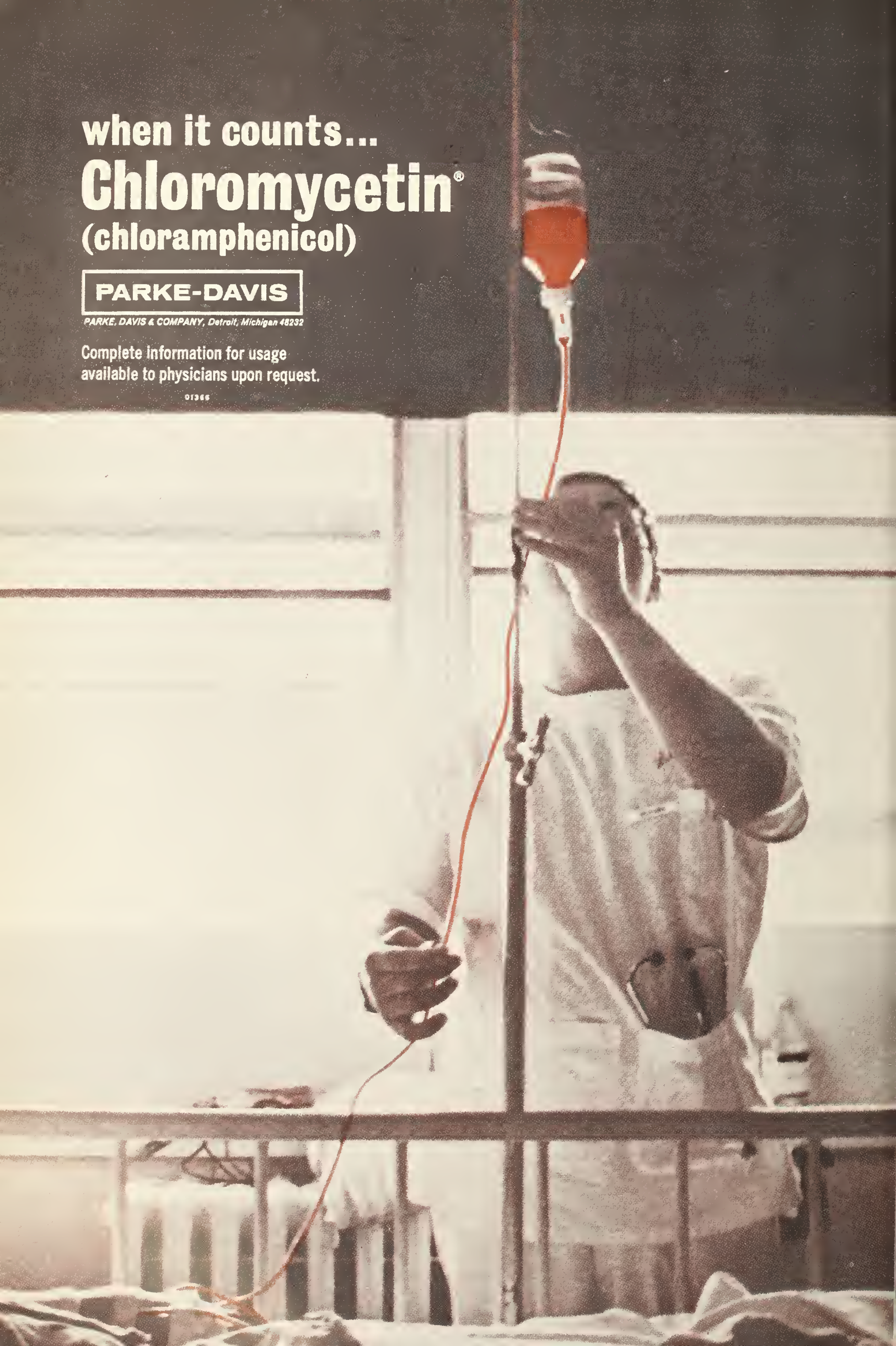

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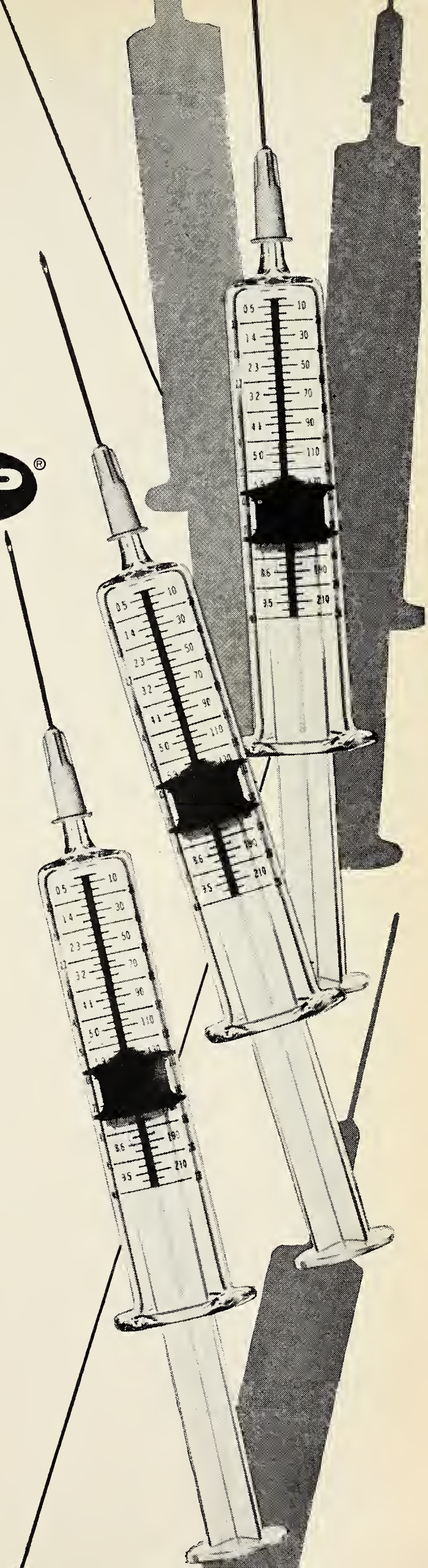

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Precautions: As with all new drugs, blood and liver function tests are advisable during prolonged treatment. **Pending further experience, like most chemotherapeutic agents, this drug should not be given in the first trimester of pregnancy. It must be used cautiously in patients with liver disease or severe impairment of kidney function.** Because photosensitivity reactions have occurred in a small number of cases, patients should be cautioned to avoid unnecessary exposure to direct sunlight while receiving NegGram, and if a reaction occurs, therapy should be discontinued. The dosage recommended for adults and children should not arbitrarily be doubled unless under the careful supervision of a physician. Bacterial resistance may develop.

When testing the urine for glucose in patients receiving NegGram, Clinistix® Reagent Strips or Tes-Tape® should be used since other reagents give a false-positive reaction.

Dosage: Adults: Four Gm. daily by mouth (2 Caplets® of 500 mg. four times daily) for one to two weeks. Thereafter, if prolonged treatment is indicated, the dosage may be reduced to two Gm. daily. Children may be given approximately *25 mg. per pound* of body weight per day, administered in divided doses. The dosage recommended above for adults and children should not arbitrarily be doubled unless under the careful supervision of a physician. Until further experience is gained, infants under 1 month should not be treated with the drug.

How supplied: Buff-colored, scored Caplets® of **500 mg. for adults,** conveniently available in bottles of 56 (sufficient for one full week of therapy) and in bottles of 1000. **250 mg. for children,** available in bottles of 56 and 1000.

References: (1) Based on 23 clinical papers, 1512 cases. Bibliography on request. (2) Bush, I. M., Orkin, L. A., and Winter, J. W., in Sylvester, J. C.: Antimicrobial Agents and Chemotherapy—1964, Ann Arbor, American Society for Microbiology, 1965, p. 722.

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*As many as 9 out of 10 urinary tract infections are now caused by gram-negative organisms: E. coli, Klebsiella, Aerobacter, Proteus, Paracolon or Pseudomonas[2]... However, infections of the urethra and prostate caused by non-gonococcal gram-negative organisms are believed to be less prevalent.

MICHIGAN MEDICINE

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Volume 66, Number 7

The cover this month helps launch a special short-range educational effort by the Michigan State Medical Society to promote Family Life Education. All county medical societies and individual physicians are urged to take a leadership role.

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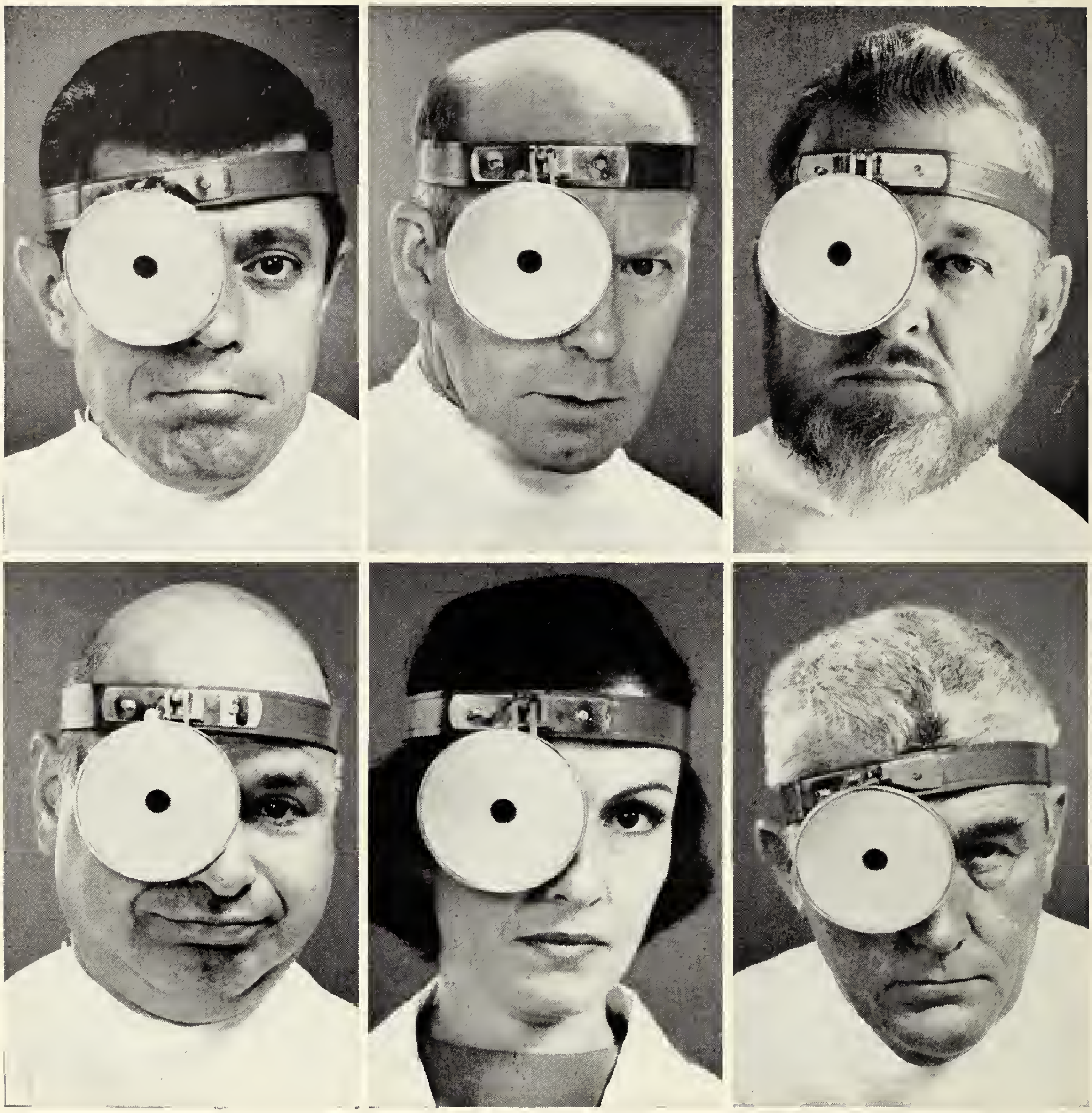

"All Otolaryngologists are Alike"

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You might also say that all otolaryngologists aren't alike, either.

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president's message

THE NEED FOR CONTINUING MEDICAL EDUCATION

All physicians and large segments of the public are aware of the revolutionary developments in medical knowledge, the dramatic advances in surgical skills, and the development of new vaccines and miracle drugs.

The informed public also knows that a widening gap exists between the best that medicine can offer and the medical services actually available to patients in some areas.

To a considerable degree the current problems of medicine are created by the tremendous advances in scientific medical knowledge. At its best the practice of medicine has matched these advances, but too often the average practice does not equal the best.

The judgment is widely expressed in and out of medicine that the changes in medical practice have not been profound enough to keep pace with the growth of medical knowledge and the rise in society's expectations and demands.

Medical knowledge has been growing so rapidly that no practitioner can safely rely on what he learned as a student or resident or consider his own resources as adequate for optimal patient care. It is more true now than ever before that a physician, in order to remain highly competent, must continue to be a serious student throughout his entire professional life. This challenge to continually improve and up-date one's medical knowledge increases with the number of years one practices medicine.

One of the major objectives of nearly all organized groups of physicians concerns some aspect of improvement of medical practice. Today great effort and large sums of money are spent on developing meetings, conferences, seminars, refresher courses, and many other types of audiovisual presentations to further reduce the gap between available medical knowledge and the actual practice of the art of medicine. Many such endeavors are far less successful than they might be. Whether this is due to improper planning, lack of interest on the part of physicians, or concern over their daily practice load has not been clearly delineated. Probably all of these, plus other factors, play a part in the ineffectiveness of some postgraduate efforts.

Postgraduate education has always been one of the chief concerns of the Michigan State Medical Society. The Committee on Postgraduate Education is one of our most active committees and has over the years developed many programs which have been very useful in reducing the gap between available medical knowledge and its use in the day-to-day care of patients. The MSMS Annual Sessions have been outstanding in providing nationally known experts in all fields of medical practice.

However, the widening gap between medical knowledge and practice, the increased demand for medical services, and the increasing patient load per physician makes it necessary for us to reevaluate our existing programs with the idea of further improvement and effectiveness. A subcommittee of the Committee on Postgraduate Education is now beginning work on such a project by trying to assess the effectiveness of our present programs. I am sure that the members of this Committee and the officers and members of The Council would be most interested in any ideas the membership of MSMS might have on this subject.

I cannot too strongly emphasize, however, that basic to the resolution of this gap between medical knowledge and day-to-day practice is the rededication of physicians to individual responsibility in providing themselves with the knowledge necessary to treat their patients with the best that medicine can provide.

C. Allen Payne MD

PLANS WELL UNDERWAY FOR ANNUAL SESSION; MARK YOUR CALENDAR

Several committees are busy these months moving along plans for the 1967 MSMS Annual Session to be held in Grand Rapids, September 24-28.

Plans are now underway for the House of Delegates session on September 24-25-26 and the Scientific Session on September 27-28 at the Civic Auditorium.

Already at work are Harold H. Hiscock, M.D., Flint, General Chairman of Arrangements; Harry A. Towsley, M.D., Ann Arbor, Chairman of the Scientific Program; Dale L. Kessler, M.D., Grand Rapids, Local Chairman of Arrangements; and Craig E. Booher, M.D., Grand Rapids, Chairman of the Scientific Exhibits Committee.

DOW OFFERS NEW BOOKLET

A new, 12-page booklet explaining the nature and properties of vinyl bromide is now available free from Inorganic and Bromine Chemicals section of Chemicals Sales, The Dow Chemical Company, 2020 Abbott Road Center, Midland, Mich. 48640.

Discussing the forthcoming Yates Lecture, t be delivered by the Rev. Paul McCleave, Dire tor of the AMA's Department of Medicine an Religion, are, from left to right: Winslow Fo M.D., Ann Arbor, Chairman of the MSMS Con mittee on Medicine and Religion; Rev. M Cleave; and James Stokley, who teaches sc ence writing at Michigan State University. Th Lecture, sponsored by the Michigan Tubercul sis and Respiratory Disease Association, will b given May 9 at Michigan State University.

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Side Effects: There have been occasional reports of insomnia and nervousness. Rare instances of mouth dryness, nausea, blurring of vision, dizziness, constipation, and stomach pain have been noted.

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Abstract: Primary ovarian pregnancy is a rela- ively rare situation with fewer than 66 cases in ll English literature. We have encountered eight ases of primary ovarian pregnancy during which ime 118,904 pregnancies were managed at Mt. 'armel Mercy Hospital, Detroit. The typical pri- ıary ovarian pregnancy is a patient 29 years old, ıultiparous, with signs of intraperitoneal blood oss. The duration of symptoms are approximately .3 days with a pregnancy duration of five weeks.

Primary Ovarian Pregnancy

Y WILLIAM S. FLOYD, M.D.
DWARD KLIMKOWSKI, M.D.
. LEONARD COHN, M.D.
LL OF DETROIT

Primary ovarian pregnancy is a relatively rare ituation estimated to occur in 1 per 25,000 preg- ancies. The literature contains fewer than 150 otal reported cases, 66 cases in English literature.

From January 1939 through December 1962 we ave encountered eight cases of primary ovarian regnancy during which time 118,904 pregnancies vere managed. This figure included all deliveries, bortions except threatened abortions, and extra- terine pregnancies. *Table I* illustrates these fi- ures from year to year. A statistical comparison f our findings and those quoted in the literature s shown in *Tables II* and *III*. All of the cases to e reported have fulfilled Speigelberg's criteria: The tube on the affected side must be intact including the fimbriated end; the fetal sac must occupy the position of the ovary; the ovary must be connected to the uterus by the ovarian ligament; ovarian tissue must be found in the wall of the sac.[5]

CASE REPORTS

CASE 1 — A 20-year-old nulligravida female was admitted with a two-day history of lower abdominal pain radiating to the right scapula. She was admitted on July 11, 1951, after a syncopal episode. Her last menstrual period was June 21, 1951. She had had no abnormal uterine bleeding. Examination revealed a markedly tender, right pelvic mass. A right ovarian cyst was resected at the time of laparotomy. The peritoneal cavity contained 1500 cc of blood.

The gross specimen consisted of a dark mass, mostly clot, but on cut section revealed a 1 cm cyst filled with a watery fluid and lined by a smooth membrane. Sections demonstrated young placental villi and remnants of the amniotic sac.

Doctor Floyd is Clinical Assistant Professor and)octor Cohn is Clinical Instructor, both in Obstet- 'cs and Gynecology at Wayne State University chool of Medicine. All three are associated with he Department of Obstetrics and Gynecology at It. Carmel Mercy Hospital, Detroit.

TABLE I

TYPES OF PREGNANCIES MANAGED AT MOUNT CARMEL MERCY HOSPITAL
1939 - 1962

YEAR	NO. DELIVERIES	NO. ABORTIONS (ALL TYPES BUT THREATENED)	ECTOPICS (ALL TYPES)	PRIMARY OVARIAN PREGNANCIES
1939	721	47	10	
1940	1597	75	14	
1941	2553	100	20	
1942	4296	195	29	
1943	4272	182	24	1
1944	3610	204	17	
1945	3666	216	26	
1946	4501	321	26	
1947	4726	241	21	
1948	4665	264	32	
1949	4773	297	14	
1950	5485	319	29	
1951	6113	421	24	2
1952	6463	456	33	
1953	5865	413	34	1
1954	6299	379	33	
1955	6418	436	38	1
1956	6615	528	36	
1957	6733	521	39	1
1958	6106	540	37	1
1959	5790	439	30	
1960	5123	391	23	
1961	4505	394	16	1
1962	4190	318	12	
TOTAL	110,904	7,379	605	8

CASE 2 — A 38-year-old female was admitted on July 15, 1951, with a three-day history of severe abdominal pain and vaginal spotting. She had had a scant period on June 15, 1951. Her abdomen was distended and tender. A laparotomy was performed with a pre-operative diagnosis of a ruptured tubal pregnancy. A normal uterus and fallopian tubes were found and an ovarian dilatation. The ovarian cyst was resected. The ovarian cyst contained a fetus 8 cm in crown-heel length and placental tissue. Sections of the ovary demonstrated normal trophoblastic elements in the meso-ovarium.

CASE 3 — A 20-year-old multipara patient was admitted on July 21, 1953, with an acute abdominal and right shoulder pain. A culdocentesis revealed free peritoneal blood. Pelvic examination revealed a palpable mass in the area of the right broad ligament. A laparotomy was performed and a bleeding mass of the right ovary was resected revealing on microscopic section a blood clot and well-formed, young placental villi.

CASE 4 — A 30-year-old female was admitted on May 13, 1952, with lower abdominal and right shoulder pain. Her last menstrual period was two weeks prior to admission. The examination revealed an acutely tender abdomen and a righ adnexal mass. A pregnancy test was positive. A provisional diagnosis of a ruptured corpus luteum cyst or tubal pregnancy was made. At laparotomy a cyst was resected revealing on microscopic examination ovarian stroma and a cyst filled with a blood clot in which placental villi were identified

CASE 5 — A 35-year-old multiparous patient wa admitted on May 16, 1958, with a two-day history of abdominal pain, nausea, and mild emesis. Her last menstrual period was March 8, 1958. She had had a syncopal episode at the time of admission A culdocentesis yielded non-clotting blood. A lef oophorectomy was done and revealed corpu luteum containing a blood clot and placental tissue. Both fallopian tubes were normal.

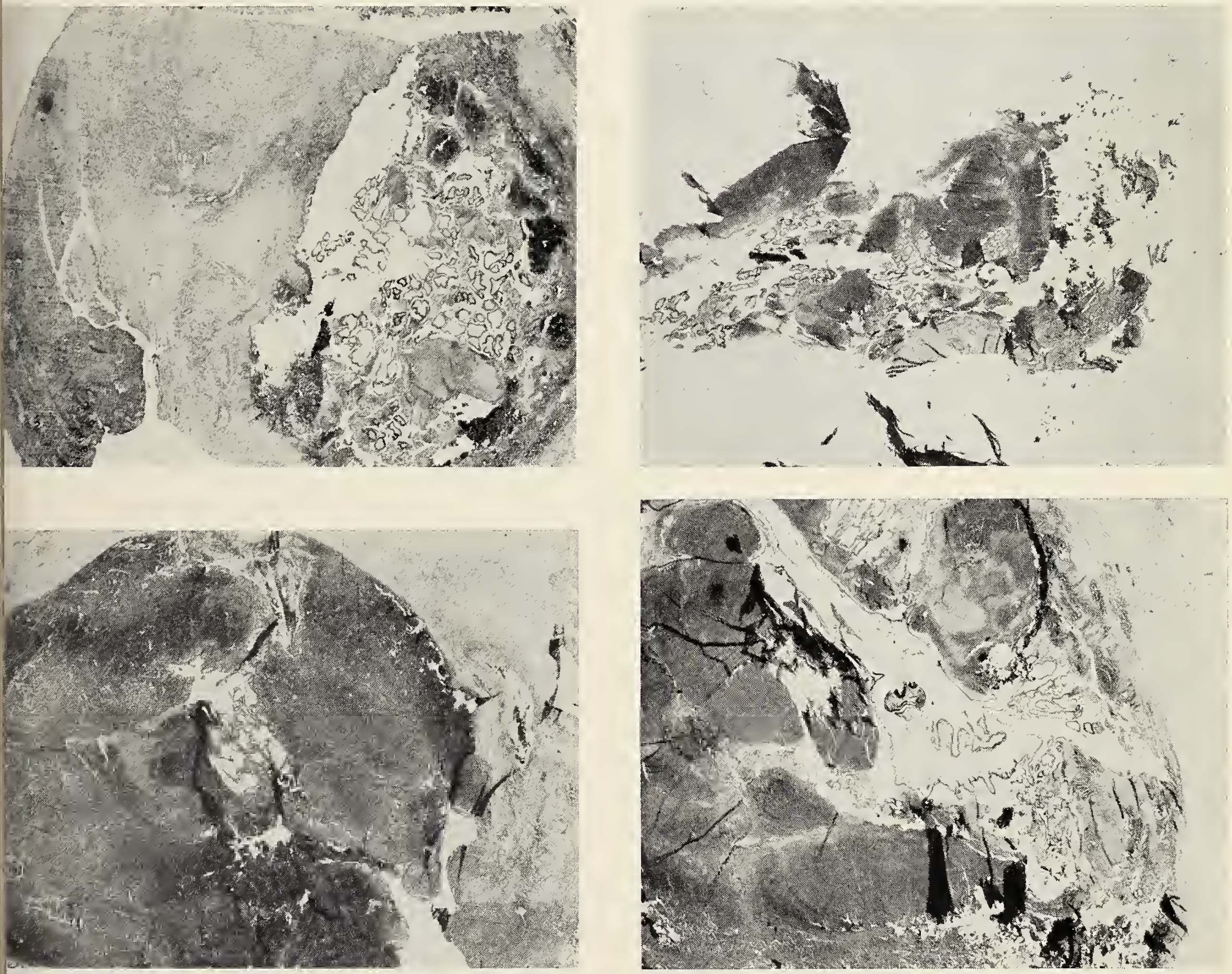
CASE 6 — A 30-year-old multiparous patient wa admitted on September 5, 1957, with lower abdominal and shoulder pain. Her last menstrua period was July 22, 1957. A pregnancy test had been positive. The impression at time of laparotomy was a corpus luteum with peritoneal blood A right partial oophorectomy was performed. Microscopic sections demonstrated typical ovarian troma containing a corpus luteum with blood clot nd, adherent to one border, placental villi.

CASE 7 – A 36-year-old nulligravida infertility atient was admitted for an uterine suspension. Ier pertinent history consisted of infertility, peristent backaches, and a retroverted uterus. A right varian cyst was discovered at the time of uterine uspension and was enucleated. Microscopic secions showed the cyst to be filled with blood clot ontaining young placental villi.

CASE 8 – A 25-year-old multiparous patient was een on August 18, 1962, with a sudden onset of ower abdominal pain following defecation. Her last normal menstrual period was August 10, 1962. There was a generalized abdominal tenderness. A culdocentesis revealed intraperitoneal blood. The preoperative diagnosis was a ruptured corpus luteum cyst. At laparotomy 1500 cc of blood was present in the peritoneal cavity. A bleeding ovarian cyst was resected. The anatomical report was a hemorrhagic corpus luteum containing placental tissue.

RESULTS

Ovarian pregnancy is a rare occurrence related to tubal pregnancy etiologically and symptomatically. The literature has been devoid of suf-



FIGURES 1-4

The above illustrations are sections through the ovaries of the first four cases reported in the text. In each case placental tissue is present with well formed villi and trophoblastic elements.

ficient cases. Our experience of eight cases in one hospital and an additional case in another hospital would indicate that the diagnosis of ovarian pregnancy is either missed or not reported. The literature now contains 66 cases. The reported incidence of ovarian pregnancy as compared to other series is as in *Table II* per pregnancy and per extrauterine pregnancy in *Table III*. Our incidence was 1 ovarian pregnancy per 15,000 uterine pregnancies and 1 per 78 extrauterine pregnancies, more frequent than the reported literature. A diligent search for placental tissue of excised ruptured corpora lutea may yield an unsuspected ovarian pregnancy. All of our pregnancies were intrafollicular, two unruptured. Only one prior case of an unruptured ovarian pregnancy has been reported.

AGE RANGE

The age range was 20 to 38 years with an average of 29 years, comparing favorably to 28.7 years of Boronow's. Only two patients were below 30 years of age.

PARITY

There were six multiparous patients and two nulliparous patients with an average of two pregnancies per patient. The two nulliparous patients had infertility problems.

DURATION OF PREGNANCY

Two last menses were uncertain, the remaining six cases range from three to seven weeks. This

TABLE II
REPORTED INCIDENCE OF OVARIAN PREGNANCY

	NO. PREGNANCY	NO. OVARIAN PREGNANCY	INCIDENCE
Mt. Carmel Mercy Hospital	118,904	8	1:15,000
Hertig	—	—	1:25-40,000
Boronow et al.	36,914	4	1:9,229
Dowling	59,740	1	1:59,740
Bobrow	52,833	1	1:52,833

TABLE III
REPORTED INCIDENCE TO EXTRAUTERINE PREGNANCY

	NO. EXTRAUTERINE PREGNANCIES	OVARIAN PREGNANCIES	INCIDENCE
Mt. Carmel Mercy Hospital	617	8	1:78
Hertig	—	—	1:117-950
Bobrow	950	1	1:950

TABLE IV
CLINICAL DATA

NO.	AGE	PARA	DURATION SYMPTOMS	PAIN	CUL-DE-SAC ASPIRATIONS	WEEKS PREGNANT
1	25	M	1 day	++++	Positive	5
2	36	O	None	0	None	Unknown
3	30	M	2 days	++	None	3
4	35	M	2 days	+	Positive	7
5	30	M	1 day	+++	None	4
6	20	M	1 day	+++	Positive	Unknown
7	38	M	3 days	+++	None	6
8	30	O	2 days	+	None	5

is shorter than that reported for tubal pregnancy termination. The intrafollicular pregnancy terminated early and dramatically.

SYMPTOMS AND SIGNS

One case was inadvertently diagnosed at the time of laparotomy for a uterine suspension. The remaining cases had pain, bleeding, amenorrhea, abdominal distention, syncope, and a bulging cul-de-sac as diagnostic criteria. The average duration of symptoms prior to diagnosis ranged from hours to three days, averaging 1.3 days. The primary complaint was pain, classical of a ruptured extrauterine pregnancy with severe lower abdominal pain and right shoulder pain graded from + to ++++ in *Table IV*. The cul-de-sac was aspirated of non-clotting blood in three cases. Rapid diagnosis and treatment prevented development of shock in all of these cases.

ANATOMICAL FINDINGS

The right side was involved six times (75 percent), all intrafollicular. Peritoneal blood was present in all six cases, 500 to 1500 cc, average 690 cc. Two cases were unruptured ovarian pregnancies.

The appearance of the ovaries was a ruptured corpus luteum with active bleeding in six cases. The other tube and opposite ovary were normal in all cases. There was no evidence of endometriosis, adhesions, or pelvic inflammatory disease in the above eight cases. *(Table V)*

CO-AUTHORS

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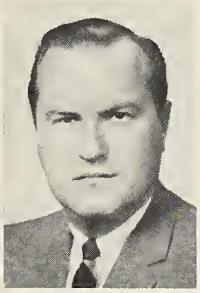

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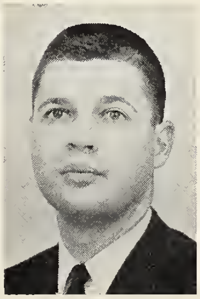

TABLE V
OPERATIVE FINDINGS

NO.	SIDE INVOLVED	*PERITONEAL BLOOD
1	Right	1500 cc
2	Right	None
3	Left	500 cc
4	Right	1000 cc
5	Right	500 cc
6	Right	1000 cc
7	Left	None
8	Right	1000 cc

*Estimated

COMMENTS

The largest series of primary ovarian pregnancy is reported with tabular summary of symptoms, duration, and operative findings. The incidence of ovarian pregnancy is greater than suspected from the literature. The pregnancy ruptures early with dramatic symptoms similar to a ruptured tubal pregnancy; a large intraperitoneal blood loss occurs. The right side is more frequently involved. The average patient was a 29-year-old multiparous female. The treatment in all cases was an ovarian resection of the ruptured corpus luteum. One inadvertent laparotomy was performed with enucleation of the corpus luteum cyst. The findings of villus tissue was an unsuspected diagnosis.

SUMMARY

1. Eight cases of primary ovarian pregnancy are added to the English literature.

2. The average patient was a 29-year-old multiparous female with signs of intraperitoneal blood loss.

3. Duration of symptoms was 1.3 days.

4. The duration of pregnancy was approximately five weeks.

5. The treatment consisted of ovarian resection.

REFERENCES

1. Bobrow, Leo and Bell, Hugh. Ectopic Pregnancy: A 16 Year Survey of 905 Cases *Obst. & Gynec.* 20:500 1962.
2. Boronow, R. C., McElin, T. W., West, R. H., *et al.* Ovarian Pregnancy *Am. J. Obst. & Gynec.* 91:1095 (April) 1965.
3. Dowling, Edmund A., Collier, Fred C. and Bretachneider, B. S. Primary Ovarian Pregnancy *Obst. & Gynec.* 15:58 1960.
4. Hertig, A. T. Discussion of Gerin-Lajoie *Am. J. Obst. & Gynec.* 62:926, 1951.
5. Spiegelberg, O. Zue Casuistik der Ovarialschwagerschaft *Arch. Gynak.* 13:73 1878.
6. Hill, Robert M. Ovarian Pregnancy *Northwest Medicine* 57:747 (June) 1958.

Abstract: Nutritional anemia in infants of concerned and intelligent mothers prompted review of health education material available to mothers on infant feeding for mention of iron-deficiency anemia, of the commonly recognized danger of excessive milk intake causing it, of iron needs and sources, and of the technique of limiting intake of one food to encourage intake of other foods. Very little was found about iron-deficiency anemia and its prevention.

Nutritional Anemia: Role of Excessive Milk Intake

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The commonest type of malnutrition in young children in the United States is iron-deficiency anemia, also called nutritional anemia or hypochromic anemia. It is usually due to inadequate iron intake which is often associated with excessive intake of milk. This condition may not be serious, but seems to be associated with susceptibility to respiratory infections.

Since this anemia is preventable, parents of these children can be presumed to be either neglectful or innocently unaware of the nutritional needs of their children and how to meet them. The frequent occurrence in the University of Michigan Pediatric Clinic of nutritional anemia in children of concerned, responsible, and intelligent parents raised the question of the adequacy of current health education in this area. Material on infant

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feeding available to parents was reviewed and considered as it related to nutritional anemia and its prevention.

PROBLEM OF NUTRITIONAL ANEMIA

It is generally accepted that there is a high incidence of nutritional anemia in "low income" or "disadvantaged" populations. Haughton[1] in 1963 found that 41 percent of the infants under 1 year of age seen in Child Health Stations in New York City had hemoglobin levels below 10 gm/100 ml. Andelman and Sered,[2] in a study using an iron-containing formula to feed infants served in Chicago Child Welfare Stations for a period of six to nine months, found hemoglobin levels below 10 gm/100 ml in 76 percent of the control infants. The control infants were not given the iron-containing formula, but did receive the "prevailing mode of pediatric supervision," and strained foods were started at 3 months of age.

Nutritional anemia at the University of Michigan Pediatric Clinic is not seen primarily in children from very low socio-economic levels. Few truly indigent children are seen at this clinic. Yet one or two children weekly are diagnosed as having nutritional anemia. Typically, the intake of milk is excessive, often 1½ quarts. Occasionally these are premature infants whose diets have not been supplemented with iron. Most often, however, it is not inadequate prenatal iron stores, but inadequate intake of iron and excessive milk intake that causes the anemia. This seems excessive if there were only an occasional over-use of milk, as suggested by C. A. Smith[3] in 1960.

THE FOLLOWING EXAMPLES are typical cases of nutritional anemia seen at the Pediatric Clinic:

(1) A 17-month-old girl was seen because her parents wanted to check on an anemia which had been noted and treated with iron two months previously. Hemoglobin had gone from 9 to 11.2 grams percent. The baby's diet, however, still consisted of 1½ quarts of milk a day, a weekly one-pound box of cookies (placed where she could eat them at will), frequent snacks at home and at the neighbors, and considerable "sweets." Milk was being taken by cup and by bottles which were given at 8:00 pm, 12:00 am, and 3:00 am. She did not like eggs or cereal. Immunizations had been given. With support and instruction the parents were able to set limits which included limiting snacking, removing the cookie box, and eliminating all of the nighttime milk except a small amount by bottle at 8:00 pm. When seen two weeks later, hemoglobin was 12.9 grams percent, and, more importantly, the feeding pattern had been altered with little or no fuss.

(2) An 18-month-old boy was being followed in the Cardiac Clinic for his inter-ventricular septal defect, which he was tolerating well. When seen he was pale and sallow, clutching his bottle. Immunizations had not been given because of frequent colds. These were conscientious parents who were concerned about his slow development. Hemoglobin was found to be 7.0 grams percent and milk intake was about 1½ quarts daily. The mother had thought he was getting too much milk, but the father had resisted limiting the bottle. With support and instructions about limiting milk they were able to easily change his eating habits so that milk was limited and his intake of iron-containing foods was increased. Iron therapy was started and hemoglobin rapidly increased.

IN THESE AND similar cases parental lack of knowledge and, at times, insecurity seem the major reasons for the feeding pattern that leads to nutritional anemia. In addition to lack of knowledge, parents often have one or more of the following characteristics:

(1) Insecurity about setting any limits for their child. This is especially common if the parents have ambivalent feelings about the child. Too, it is often seen in parents of handicapped children, especially children with convulsions or congenital heart disease.

(2) Lack of time to spend trying to feed solid foods and a tendency to increase milk intake to satisfy hunger. This is often seen in mothers of large families and in working mothers.

(3) Undue concern about satisfying their baby's sucking needs.

(4) Marked reluctance to let their baby cry because of possible psychological trauma.

AUTHOR
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(5) A tendency to equate food, especially milk in a bottle, with love.

(6) A tendency to use a bottle of milk as a pacifier.

APPROACHES IN INFANT FEEDING

Health education material on infant feeding was reviewed for mention of iron-deficiency anemia and its prevention. *Baby and Child Care* by Spock[4] and the Children's Bureau publications *Infant Care*[5] and *Your Child from One to Six*[6] are widely used sources of information for parents on infant feeding. These publications give little emphasis to iron-deficiency anemia and contain little that is specific to guide parents in its prevention. These and two major textbooks of pediatrics were reviewed.

In Spock,[4] material on nutritional anemia and its relation to excessive milk intake was found in the last two paragraphs of 100 pages devoted to infant feeding. These two paragraphs are concise and clear and state that it is important that a child not take more than a quart of milk a day. In the section on bottle feeding Spock indicates that a 9- to 10-pound baby will probably take 30 ounces of formula daily. However, he is not, in this section, specific about limiting milk intake to one quart. Spock does note that milk has very little iron and that solids such as egg yolk and baby cereal contain iron. Elsewhere in Spock considerable attention is given to relying on the infant's appetite to guide his diet and to Clara Davis' studies on self-selection of diet by infants. From this some parents might assume they can simply offer a variety of nutritious foods and be satisfied that their infant will select an adequate diet without limits or guidance.

The popular pamphlets *Infant Care*[5] and *Your Child from One to Six*[6] and the abbreviated versions, *Your Baby's First Year*[7] and *Your Child from 1 to 3*,[8] which have been designed for mothers needing simpler reading material, are widely distributed by physicians, health departments, and well child clinics. The only specific mention of iron deficiency found on review of these pamphlets was in the section on "Children's Diseases and Disorders" in "Your Child from One to Six."[6] Lack of iron is noted as the last of four reasons "why a child may have anemia," and dietary sources of iron are listed.

NO SPECIFIC RECOMMENDATION about limiting milk intake and no discussion of the relation of excessive milk intake to iron deficiency was found in these pamphlets. Limiting intake of milk or other foods to encourage consumption of necessary foods is suggested in statements such as the following: "When he gets to the place where a quart of formula a day doesn't keep him happy, increase the amounts of cereal and other foods;"[5] and "Some will take milk readily but if they drink 3 to 4 cups they have almost no appetite left for other essential foods. You and your doctor together can work out a plan for adjusting the quantity of milk and of other foods so that a given child can be well fed on food that he enjoys eating."[6]

In *Your Child from One to Six*[6] and in Spock[4] the *required* or needed amounts of various foods for young children are given. The amount of milk noted is "3 to 4 measuring cups"[6] or "1½ to 2 pints."[4] It is not specified that these should be maximum amounts. Equal weight in these outlines of food requirements seems to be given to the potato or starchy vegetable item as to the meat-poultry-fish item. Emphasis is given to sources of vitamins D and C and to specific amounts of foods which contain the daily requirements of these vitamins. Needs and sources of iron are not similarly emphasized. Iron-enriched cereals, for example, are not cited as better sources of iron than plain oatmeal.

The pamphlets *Your Baby's First Year*[7] and *Your Child from 1 to 3*[8] have been developed for mothers needing simpler reading material. This would include many mothers from lower socioeconomic levels, where iron-deficiency anemia is common. Iron deficiency, its prevention, and its relation to excessive milk intake, is not discussed in these pamphlets. Specific mention is made of Vitamins D and C, but not of iron. The pamphlet *Your Baby's First Year*[7] does advise an intake of 2 to 5 tablespoons once or twice a day of enriched cream of wheat, strained oatmeal, or baby cereal by the time an infant is 6 to 7 months old.

IN GENERAL THESE publications for parents do not emphasize the common condition of iron deficiency and its relation to excessive milk intake. Outlines are given for recommended diets, but little attention is given to the technique of limiting intake of certain foods to encourage intake of other foods to achieve the recommended diet. Since considerable emphasis in some of this material is given to satisfying infant demands, it is not surprising that insecure, busy, or over-protective parents let their infants have all they "demand" (usually bottles of milk), unaware of the danger of anemia and of future feeding problems.

The two pediatric texts which were reviewed differ in the extent to which iron-deficiency anemia and techniques for its prevention are emphasized. In the section on infant feeding in Holt's *Pediatrics*,[9] the advisability of limiting milk intake to an amount supplying 650-700 calories a day and the need for iron in the diet is covered. Iron-deficiency anemia and its relation to excessive milk intake is discussed in the section on nutrition. Reasonable balance of limits and self selection in infants' diets is advised.

Nelson's *Textbook of Pediatrics*[10] was also reviewed. In the section on "Nutritional Requirements" the problem of excessive intake of one kind of food leading to inadequate intake of another kind is stated, and the example is given of overconsumption of milk leading to iron-deficiency anemia. The section on "Anemia of Iron Deficiency" discusses the relation of feeding problems and diets made up of milk and carbohydrate foods to iron-deficiency anemia and advises limitation of such foods in treatment. The section on "The Feeding of Infants" states that it is rarely necessary to use more than 13 ounces of evaporated milk or 1 quart of whole milk a day. The relation of excessive milk intake to inadequate iron intake and iron deficiency is not covered specifically in this section on feeding, however.

In infant feeding it is important to recognize that advice that bases the starting of solids on age may conflict with advice about limitation of milk intake to a specific volume. If solids are introduced at a given age, say 2 to 3 months, rather than when an infant's intake is about 1 quart of milk or formula, many infants may be taking well over a quart per day before solids are started. It is not unusual to find a large infant who, even in the newborn nursery, is not satisfied with 32 ounces a day.

SUMMARY

Prevention of iron-deficiency anemia, a common nutritional disease of infancy, is not emphasized in popular material for parents on infant care. Parents reading the reviewed material are not likely to be impressed with the danger of iron deficiency, its association with excessive milk intake, and the need for and sources of iron in infant diets. If advice about responding to infant demands for preferred foods and about starting solids at a specific age is rigidly followed, many infants are likely to consume excessive amounts of milk.

It is recommended that material on infant feeding for parents balance attention to psychological needs with attention to physical needs, balance license with limits, give as much attention to iron needs as to Vitamin C and D needs, and provide parents with specific information about content of iron and vitamins in infant foods. Relative to the prevention of iron-deficiency anemia it is suggested that:

(1) Formula or milk intake be limited to 1 quart a day with cereals started as this limit is approached. This is usually when the infant weighs 10 to 11 pounds. In smaller infants solids should be started at 2 to 3 months even if milk intake is less than 32 ounces.

(2) Emphasis be given to the difference in the child's control over what he will eat and the parents' control over what he is offered. Parents can limit one food to encourage intake of other foods.

(3) Early self-feeding by infants be encouraged and milk be offered by cup starting at approximately 5 months.

(4) Special support be given to susceptible parents to help them guide their child's diet. Susceptible parents include insecure, anxious, overprotective parents, parents of handicapped children, working mothers, and perhaps parents in lower income levels.

Iron added to prepared infant formulas may be desirable for some infants, but it does not provide a substitute for establishing good eating practices or eliminate the need to educate parents on limiting milk intake.

REFERENCES

1. Haughton, J. G. Nutritional Anemia of Infancy and Childhood, *American Journal of Public Health* 53: 1121 (July) 1963.
2. Andelman, M. B. and Sered, B. R. Utilization of Dietary Iron by Term Infants, *American Journal of Diseases of Children*, 111: 45-55 (January) 1966.
3. Smith, C. A. Overuse of Milk in the Diets of Infants and Children, *Journal of the American Medical Association* 172: 567-569 (February) 1960.
4. Spock, B. *Baby and Child Care*, 1946.
5. *Infant Care*, United States Department of Health, Education and Welfare, Children's Bureau Publication, No. 8, 1963, United States Government Printing Office.
6. *Your Child from One to Six*, United States Department of Health, Education and Welfare, Children's Bureau Publication, No. 30, 1956, United States Government Printing Office.
7. *Your Baby's First Year*, United States Department of Health, Education and Welfare, Children's Bureau Publication, No. 400, 1962, United States Government Printing Office.
8. *Your Child from 1 to 3*, United States Department of Health, Education and Welfare, Children's Bureau Publication, No. 413, 1964, United States Government Printing Office.
9. Holt, L. E., Jr., McIntosh, R., and Barnett, H. L. *Pediatrics*, 1962.
10. Nelson, W. E. *Textbook of Pediatrics*, 1964.

Possible Causes of Mongolism (Down's Syndrome) And Other Chromosomal Aneuploidies

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Abstract: A brief review of some of the clinical aspects of cytogenetics is made with the presently known facts about the etiology of Down's syndrome (Mongolism). Two representative cases are presented.

Research which has followed the discovery of a chromosomal trisomy in patients with Mongolism (Down's syndrome) suggests that a number of different causes, genetic and environmental, are responsible for this condition.

Cytogenic studies are now being completed on many persons with features of Down's Syndrome and their families. Information gained from such studies is of value in genetic counseling of families, especially if a reoccurring chromosomal abnormality is found; it is also useful for diagnosis, epidemiological studies, and research. This report will (1) explain some of the essentials of cytogenetics, (2) review recent literature pertaining to causes of Down's syndrome and related chromosomal aneuploidies, and (3) describe two clinical cases in which cytogenetic studies were useful for genetic counseling or for diagnosis.

NON-DISJUNCTION

Cytogenetic studies are possible because the hereditary material in the nucleus of each cell comes

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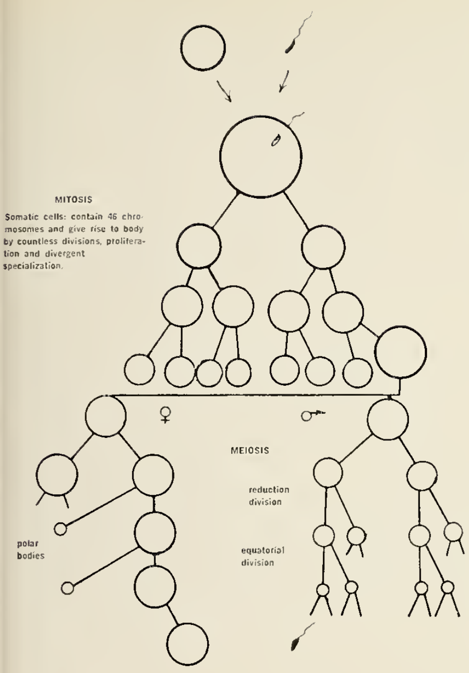

MITOSIS
Somatic cells: contain 46 chromosomes and give rise to body by countless divisions, proliferation and divergent specialization.
♀
♂
MEIOSIS
reduction division
equatorial division
polar bodies

Gametes from parent generation; each carrying 23 chromosomes (haploid number).

Fertilized ovum or ZYGOTE which contains 46 chromosomes (diploid number).

Primordial sex cells which contain 46 chromosomes and become established in the gonads of the embryo.

Oogonia and spermatogonia (46 chromosomes)

MEIOSIS

Primary oocyte and spermatocyte (46 chromosomes)

Secondary oocyte and spermatocyte (23 chromosomes)

ootid and spermatid (23 chromosomes)

Mature ovum and spermia (23 chromosomes)

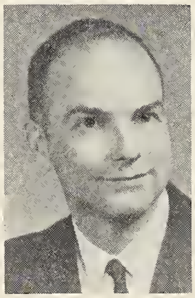
FIGURE 1. Schematic drawings of normal development of ovum and sperm (gametogenesis).

together at the time of mitotic division to form clumps called chromosomes which can be seen, counted, and studied with a regular light-microscope.[1] *Figure 1* indicates how the two gametes, ovum and sperm, each of which usually carry 23 chromosomes, come together at the time of conception to form the fertilized ovum or zygote, which usually has 46 chromosomes. After a number of mitotic divisions during which the chromosome number stays at 46, there results a conglomerate of cells, most of which make up the body of the individual (somatic cells).

A few cells become established in the gonad of the embryo as the primordial germ cells; they, too, have 46 chromosomes. Throughout life, somatic cells, at the time of division, almost always have 46 chromosomes. The germ cells undergo a peculiar type of division (meiosis) in which the number of chromosomes is reduced from 46 to 23.

EARLY IN OOGENESIS the primary oocyte is formed; in human females this occurs before the infant girl is born. At the time of birth the girl has her full complement of primary oocytes. The meiotic process in the female does not proceed until the time of ovulation when one primary oocyte will divide to secondary oocyte and polar body. Thus, in a 45-year-old woman the primary oocyte has been present for 45 years without any divisions. This may be one reason why it is often the older mother who gives birth to a child afflicted with Down's syndrome.[2] The primary oocyte has had 45 years of exposure to agents which are known to cause damage to chromosomes. Two such agents which seem to be related to birth of children with Down's syndrome are viral diseases and X-ray irradiation. Two recent reports are significant.

In 1965 Sigler, Lilienfeld, Cohen, and Westlake,[3] working in Baltimore, reviewed the radiation histories of 216 mothers of mongoloid children and 216 mothers of non-mongoloid children born in the same hospital at the same time. They found that the mothers of mongoloid children had seven



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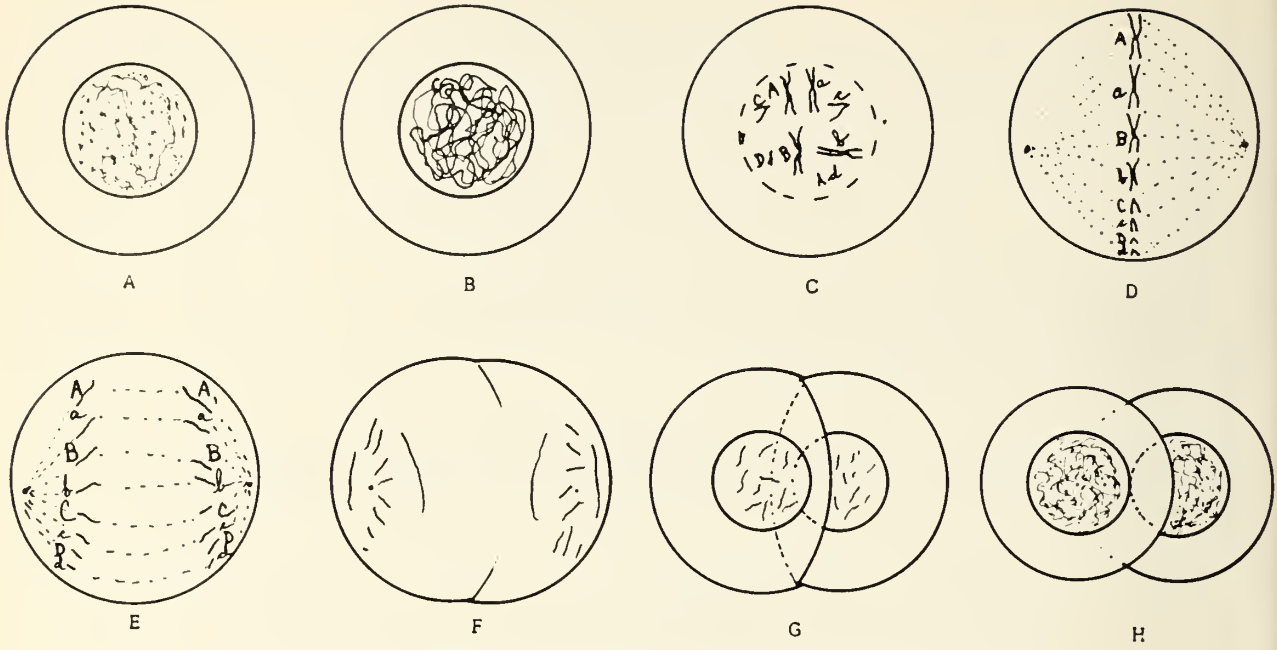


Mitosis (8 chromosomes in metaphase nuclei)
A,H—Interphase; B—Prophase; C,D—Metaphase; E—Anaphase; F,G—Telophase

FIGURE 2. Schematic diagram of normal mitotic division in the cell.

times the exposure to X-ray irradiation compared to the mothers of non-monogoloid children. Very little of this exposure occurred during pregnancy or at the time of conception. Most of it occurred over the years between menarchy and pregnancy.

Hospital workers, women who had received X-ray therapy for skin disease, and women who had received repeated fluoroscopic exams tended to have mongoloid children. It is known that patients receiving X-ray therapy will show a marked increase in percentage of somatic cells with chromosomal abnormalities.[4]

In 1965 Stoller and Collmann[5] studied the incidence of mongoloid births in Victoria Province, Australia. They noted that over 23 years there were periodic increases, occurring every seven years, in the incidence of mongoloid births. Nine months prior to these increases, there were epidemics of hepatitis. The last increase in incidence of mongoloid births was predicted because of an epidemic of infectious hepatitis.

Not all mothers of mongoloid children born during these outbreaks had clinical hepatitis; however, they may have had viremias. It is known that serum from patients with hepatitis, if added to tissue cultures, will cause abnormalities in the chromosomes. It is thought that the older primary oocytes are more susceptible to the damaging effects of the viremia.

WHEN THE BODY's cells are examined directly, as in a biopsy, no chromosomes are seen. In the nucleus of each cell there is a granular material which stains with basic dyes; it is the hereditary material and is called chromatin. This is the interphase nucleus; during this phase the genes are carrying out their various functions and the DNA molecules replicate. Just before the cell divides the hereditary material forms a coiled, thread-like structure called the spireme (prophase). The spireme breaks transversely into 46 fragments, and each fragment begins to split longitudinally to give rise to structures called metaphase chromosomes. The chromosomes line themselves on a structure called the spindle; longitudinal splitting continues, and the fragments (chromatids) migrate to opposite poles of the spindle where they break up into chromatin. Nuclear and cellular membranes form which separate the two poles and give rise to two daughter cells. Mitosis assures the distribution of the products of DNA replication to the two daughter cells in such a way that each daughter cell has the same quan-

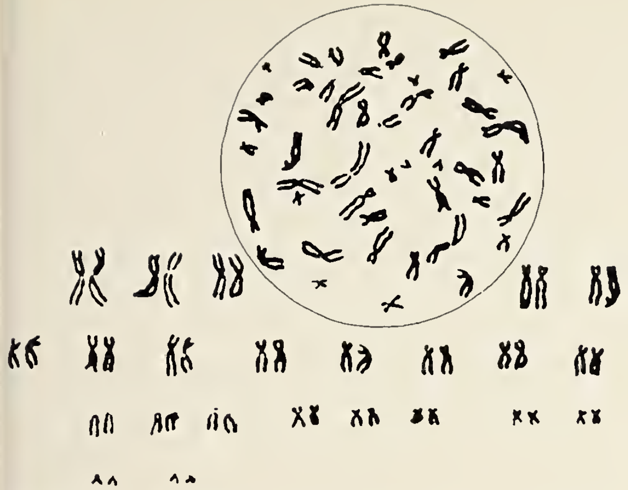


FIGURE 3. A human karyotype. The chromosomes found in the cell in a haphazard manner (in circle) are rearranged according to size and centromere position for easier identification.

tity and quality of hereditary material that the parent cell had. *(Figure 2)*

To study chromosomes in the laboratory 5 ml of blood is taken from the patient's vein; the leukocytes, suspended in serum, are added to tissue culture media which contains an antigen that causes the cells to undergo mitotic division. After approximately three days in an incubator at body temperature, the cultures receive the drug colchicine, which prevents spindle formation. Mitosis procedes to metaphase, but no further. The cells are placed in hypotonic solution which causes them to swell; they are fixed in acid alcohol, placed on a slide, and stained. Suitable cells are then photographed through a microscope, and from the photograph a karyotype is made.[6]

Figure 3 is such a karyotype. At the top is a photograph of the chromosomes as they appear in the microscope; each chromosome is cut from a duplicate photograph and charted according to its size and centromere position. The chromosomes can be paired on the basis of their morphology and grouped into seven groups; the largest chromosomes with the centromere near the center are group A; the smallest chromosomes with the centromere near the end are group G. There are 44 autosomes occurring in 22 pairs; in the female there are two X sex chromosomes placed in group C; in the male there is X sex chromosome (group C) and Y sex chromosome (group G).

Figure 4 is a diagram of the process of reduction division or meiosis which occurs in two parallel stages. In the first stage the two members of a chromosomal pair find each other and become attached to form structures called tetrads. The tetrads line themselves on the spindle; splitting at

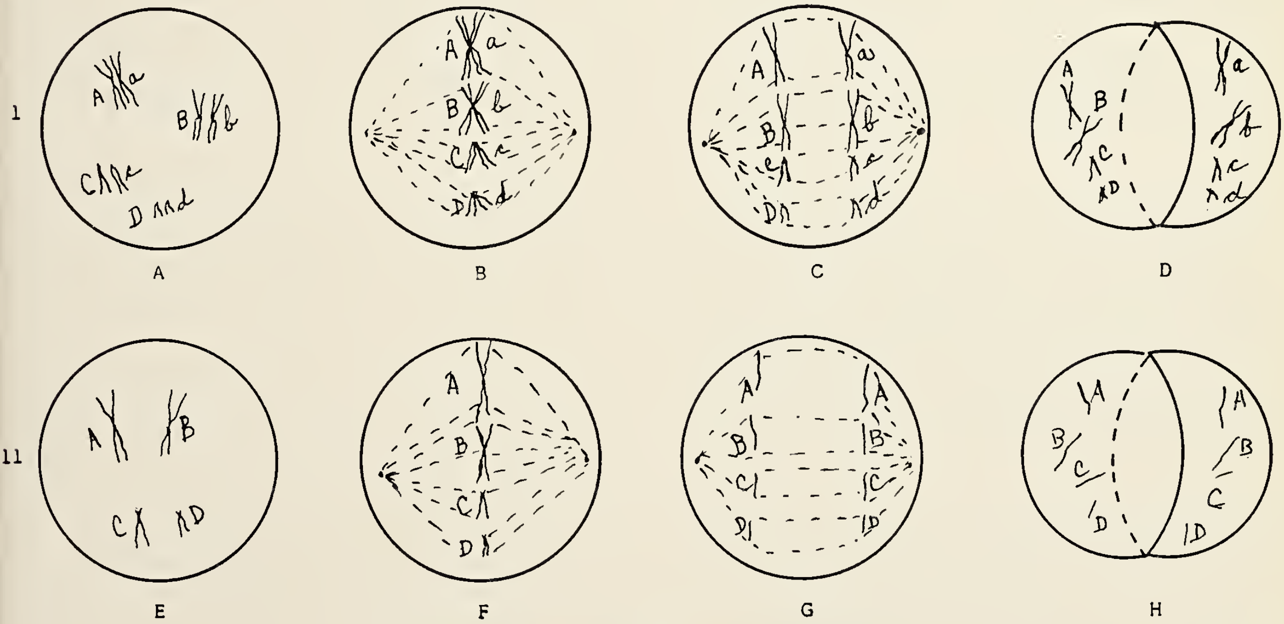
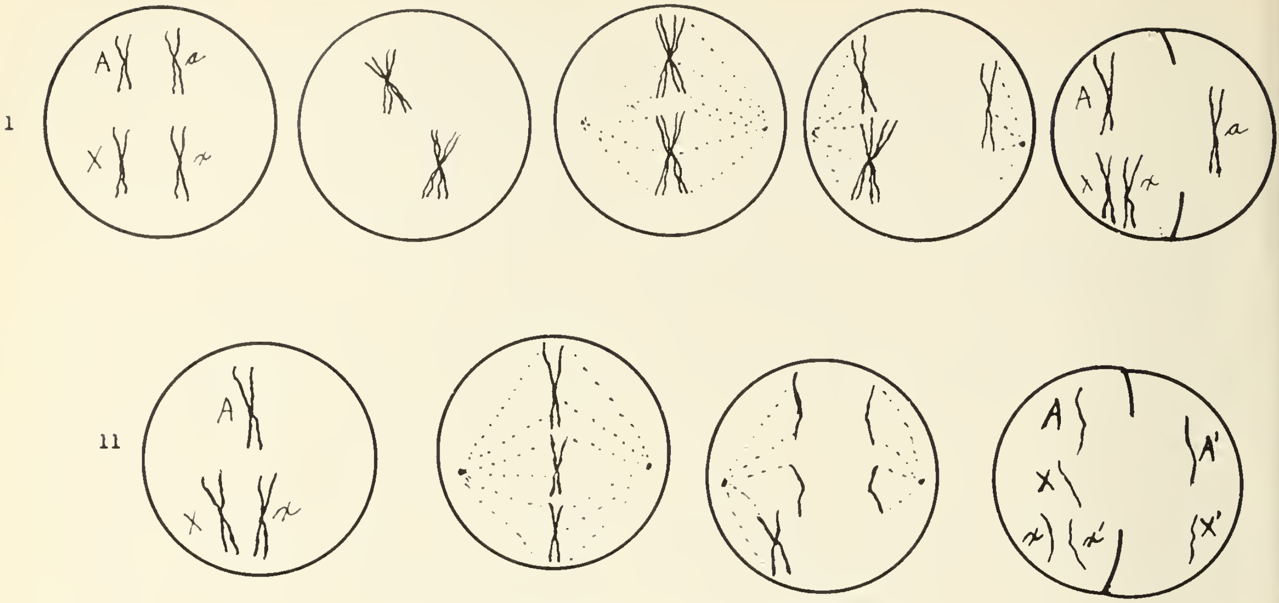
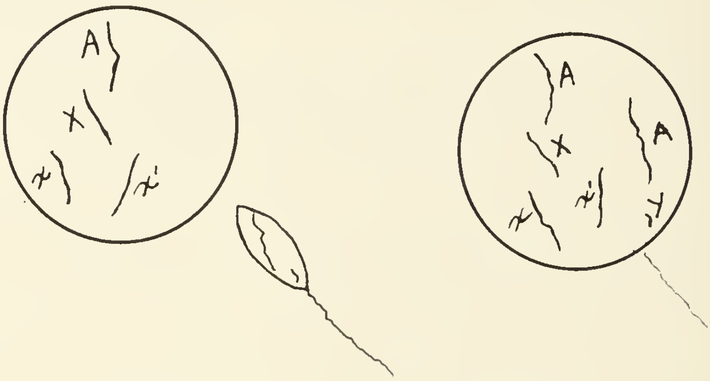


FIGURE 4. Reduction division in the cell.



Non-disjunction occurring in both stages one and two of meios is to give an ovum which contains three X set chromosomes.



The hypersomic ovum is fertilized by a normal Y containing sperm.

FIGURE 5. Diagramatic scheme of non-disjunction (see text for further explanation).

the centromere of the tetrads occurs to give structures called diads, which migrate to opposite poles. In the second stage the diads line themselves on a spindle, splitting occurs through the centromere, and the chromatids migrate to opposite poles. In oogenesis only one of the resulting four daughter cells becomes an ovum; the others are lost (polar bodies).

IN EITHER OR BOTH of the stages of meiosis, something may happen to produce a gamete with the wrong number of chromosomes.

Figure 5 is a diagram of the abnormal process known as non-disjunction. For simplicity only four chromosomes, a pair of autosomes labeled A-a, and a pair of sex chromosomes labeled X-x are shown. The homologous chromosomes form tetrads which, in turn, line on the spindle. In the diagram splitting of the autosomal tetrad occurred at the proper time (normal disjunction), and the diads migrated to opposite poles. The sex chromosomal tetrad migrated to one pole without splitting (non-disjunction), then split at the pole after the membranes began to form and separated the two poles Thus, one daughter cell has both sex chromosomal diads. If this daughter cell becomes the secondary oocyte, the abnormal process may repeat itself during the second stage of meiosis to produce an ovum which has three X sex chromosomes instead of a normal one. If this abnormal gamete is fertilized by a normal Y carrying sperm, the zygote will have 48 chromosomes; 44 autosomes and XXXY sex chromosomes. This will result in an abnormal individual in which all somatic cells will have 48 chromosomes with XXXY sex chromosomes.[7]

In most patients with Down's syndrome the abnormal process involves a small autosome (No. 21). Thus, most patients with Down's syndrome have 47 chromosomes with an extra autosome in the No. 21 position. The condition is often referred to as trisomy 21. It is not unusual for a patient to have 48 chromosomes with both a sex chromosomal trisomy and an autosomal trisomy. Such patients may have unique physical and mental findings.[8, 9]

CASE I

A girl was born when her mother was 42 and father 28 years old. She has two older sisters, both of whom are normal. Multiple defects were apparent at birth; these include (1) mongoloid facies, (2) interventricular septal defect, and (3) extrophy of the bladder. At age four years the patient has an IQ of 37. Cytogenetic studies reveal that she has 48 chromosomes with trisomy X and trisomy 21 (*Figure 6*). She also has an unusual autosome No. 16 with very long, long-arms. The peculiarity in autosome No. 16 is also noted in the mother.

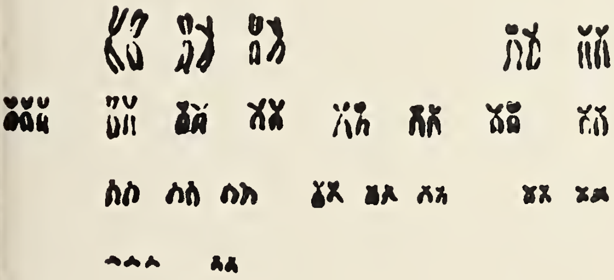


FIGURE 6. Human karyotype of a patient with clinical Down's syndrome. Trisomy (three rather than two) chromosomes of 21 and X are seen on the left of this photograph.

The differential diagnosis of mongolism vs. cretinism is not always easy, especially when a small child has both conditions.[10] The following case illustrates the usefulness of cytogenetic studies in diagnosis.

CASE II

A boy was born when his mother was 56 and father 52 years old. The pregnancy was the last of nine, three of which ended in spontaneous abortions. He has five older siblings who are normal. The mother had a kidney infection and hydramnios during the pregnancy with the patient. The patient weighed 8 lbs 11 oz at birth and a diagnosis of Mongolism was made on the basis of physical stigmata. At the age of two years the patient had physical features of cretinism; the bone age was eight months and the PBI was 0.9 micograms. He has received thyroid extract since then, and the features of cretinism have disappeared. The PBI has returned to normal. At the present time he has the features of mongolism including a patent ductus arteriosus. His IQ is less than 20. Chromosome studies reveal 47 chromosomes with trisomy 21.

The author is grateful to Mr. Edward Villis, Mrs. Richard Danckaert, A.S.C.P., Mr. Ronald Wilson, B.F.A., P.P.A., for technical assistance.

REFERENCES

1. Lennox, B. Chromosomes for Beginners, *Lancet* 1: 1046-1051 (May 13) 1961.
2. Smith, David W. Dysmorphology (teratology), *Jr. Pediatrics* 69: 1150-1169 (December) 1966.
3. Sigler, A. T., Lilienfeld, A. M., Cohen, B. H., and Westlake, J. E. Radiation Exposure in Parents of Children with Mongolism (Down's Syndrome), *Bulletin of the Johns Hopkins Hospital* 117: 399 (December) 1965.
4. Buckton, K. E., Jacobs, P. A., Count-Brown, W. M., and Doll, R. Study of Chromosomal Damage Persisting after X-ray Therapy for Ankylosing Spondylitis, *Lancet* 2: 676 (October 6) 1962.
5. Stoller, A. and Collmann, R. D. Incidence of Infective Hepatitis Followed by Down's Syndrome Nine Months Later, *Lancet* 2: 1221-1223 (December 11) 1965.
6. Special Contribution: A Proposed Nomenclature of Human Mitotic Chromosomes, *Journal of the American Medical Association* 174: 159-162 (September 10) 1960.
7. Ferguson-Smith, M. A., Johnston, A. W., and Handmaker, S. D. Primary Amentia and Microorchidism Associated with an XXXY Sex Chromosome Constitution, *Lancet* 2: 184-187 (July 23) 1960.
8. Ford, C. E., Jones, K. W., Miller, O. J., Mittwock, U., Penrose, L. S., Ridler, M., and Shapiro, A. The Chromosomes in a Patient Showing Both Mongolism and the Klinefleter Syndrome, *Lancet* 1: 709-710 (April 4) 1959.
9. Uchida, I. A., Lewis, A. J., Bowman, J. M., and Wang, H. C. A Case of Double Trisomy: Trisomy No. 18 and Triple-X, *Jr. Pediat.* 60: 498 (April) 1962.
10. Hayles, A. B., Hinrichs, W. L., and Tauxe, W. N. Thyroid Disease Among Children with Down's Syndrome (Mongolism), *Pediatrics* 36: 608-614 (October) 1965.

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How Would You Answer These Questions About Family Life Education?

The MSMS Maternal Health Committee posed these questions to several selected persons for their commentss

1. **What is the relationship between the moral and ethical issue and the academic needs in the field of Family Life Education? Will our Michigan State Legislature support legislation to aid in the establishment of comprehensive educational programs in regard to emotional, psychological, hygienic, and social responsibility aspects of family life and sexual relations?**
2. **Where do we locate adequately trained teachers in Family Life Education? Are there a sufficient number of these leaders? What are our universities providing in this regard and who determines the adequacy of training?**

BY LEE B. STEVENSON, M.D.
DETROIT

QUESTION (1):

The field of family life education must be approached in such a way that there is no reflection that would make any moral question an issue. The educator will have to decide for himself what approach is best for him as an individual if there is a tendency for the educational aspects to slip from the high moral plane. I do not see any reason for ethics to be an issue in this.

As far as the second part of question (1), about the Michigan State Legislature, I believe that this is a problem and a responsibility of the legislators. If they are properly educated as to the benefits of a program of this kind, any decisions that they make at least will have the benefit of a sound education and "community-need" background.

QUESTION (2):

The location of adequately trained teachers in family life education places the emphasis on the wrong aspect. If people are already trained teachers, the problem is to uncover those whose interest lies in the field of family life education. The real problem is to ferret out these individuals.

I am unaware of the programs that different universities provide for family life education, but I would prefer to see academic recognition of some kind, whether it be degree or a "minor," as an indication of the adequacy of training, rather than a licensing board by some governmental agency.

BY E. C. GALSTERER, M.D.
SAGINAW

It seems to me that there are two things that are necessary before we can have a good health education program in our schools, and it will do no good to persuade the boards of education of the need for such a course or to ask for legislative support until we can formulate a plan to make these available:

(1) A good curriculum guide or study plan for each level of instruction so that all schools will have approximately the same course and teachers will include all essential material. This should include both a reference list for teachers to follow in preparing their lessons and a list of literature and films available for class use and for mothers. It should also provide for some testing of students, just as in any other course.

(2) A well-trained group of teachers who have the necessary information and vocabulary to talk to young people with clarity and without evasion and who have the personality to work with students and help them to practice what they have been taught.

The curriculum guide may be developed by our Maternal Health Committee, guided, perhaps, by materials from schools which already have a successful program. The teacher training is a greater problem. Teachers need special encouragement to prepare themselves for this extra task.

(1) For a short-term project, to begin, each school could be covered by one or two experienced teachers in the community. Also, in most areas there are doctors who are willing to participate to get the program started.

(2) For those who are already teaching, this encouragement must in most cases be monetary—either a subsidy or scholarship grant to enable the teacher to take an extra course, or a boost in pay for teaching the course afterwards, or perhaps both. This is where outside help may be needed.

(3) For teachers now in training it would be desirable to have such a course required for a degree in education.

This would put the college in the position of passing on the adequacy of preparation. I frown on state pressure, but it might be desirable to have such a requirement come from the State Board of Education.

If we want the State Legislature to support and aid in such a program, we must present them with a specific plan of what we have in mind to be included in such a course. With enough pressure from local medical organizations and from parents' groups, and with emphasis on the public health aspects of such teaching, it might be possible to get such legislation. And this may be the only way to get a state-wide integrated program going. It will be quite a selling job.

It seems that local medical societies will have to work at pushing the program by impressing its importance on the boards of education. Unfortunately, some medical societies are lukewarm on this subject. This unfortunate attitude makes it impossible for local medical auxiliary groups in those counties to take any direct action.

BY FREDERICK J. MARGOLIS, M.D.

KALAMAZOO

When and if we properly document the great need for family life and sex education for the state legislators, I am convinced that appropriate legislation for training programs will result. There is much more than a ground swell going on in Michigan now for good information on this subject.

In the past few months I have talked with several thousand people at PTA's, church meetings, service clubs, and professional groups. After each session there seems to be a routine question that evolves: "What can we do; how can we help get this information disseminated in our community?" To me this is ample evidence that our citizenry wants this information and that the legislators will help make it available. As the various members of our Subcommittee on Family Life make public contacts, they should urge local groups to make

known their desires to political leaders. I am satisfied that the citizenry will do this with suggestion from us.

It should be mentioned that there are a few very necessary ingredients in making sex and family living programs acceptable and desirable to the layman. The material must be presented in good taste, and it must be presented by an authority. With these ingredients one is amazed at the acceptability of this subject matter. No one seems to be adversely critical; everyone seems interested and anxious for the information. Evidence of this is the fact that in our experience PTA attendance has gone up three- to fourfold when these subjects are discussed at their meetings.

It certainly is not necessary to use the frightening aspects of sexuality in our presentation. I am referring to venereal disease and illegitimacy. There is so much good information to relate on the valuable side of this vital human relationship that the seamy side can be deleted. We should tell about how sexuality adds to a marriage, how it adds to personal ethics and morality, and how it can be a real attribute in the development of the teenager. When these discussions are open and frank, starting from early childhood, the moral responsibility associated with sexuality becomes a natural and easy thing for a child to understand. As a teenager, then, the positive side of family living is not new to him.

We must make it known to those who establish curricula and those who finance our educational system that they have a vital role to play in the development of good attitudes and the positive side of family living.

BY CHARLES F. STOLZ, DIRECTOR

DIVISION ON THE FAMILY HUMAN RESOURCES COUNCIL

The second category in the above question, concerning adequately trained teachers in family life education, infers that there is some generally understood definition of the term "adequately trained." This is not the case. There is no certification, and few universities provide majors or minors in the field of family life education. It is my belief that "adequately trained" should mean that a teacher has had in his academic training two types of experiences: (1) academic course work and (2) functional or practical experiences. It is believed that the academic training should be of such character that the departments associated with the four major areas (anthropology, sociology, psychology, and education) provide a coordinated and interdisciplinary sequence of course instruction.

The second kind of experience, that of a functional approach, would provide experience in actual classroom situations such as student teaching combined with internship in the community where the teacher was professionally housed. During the functional phase the teacher should receive an indication of the ways to blend the knowledge — an ethical approach to family life with the academic knowledge obtained from the university. It is believed that these approaches are not being provided at the present time, and even in those universities offering majors and minors in the field of family life education, the opportunities may be limited.

Only two state universities in Michigan are providing majors or minors in the field of family life education. In the remaining five state universities a smattering of academic training in family life is obtained by taking courses from a number of colleges within the university without proper emphasis upon interrelationship between courses or an interdisciplinary approach.

In actual practice administrators hire teachers on the basis of a smattering of course work in the general area of family life education and upon the teacher's success as a family member in his own home. A survey conducted by Mrs. Betty LaChapelle, Assistant Professor in Family Life Education at Wayne State University, attempted to assess the academic backgrounds of people teaching Family Life Education in high schools. It was revealed that such courses were being taught by physical education instructors, social studies teachers, school nurses, and English teachers. The reason appears to be that few teachers are being trained in the area of family life education, and the administrator will fill the course need with anyone who is able to fill the gap. If the resource is limited, he will draw from other educational fields to meet the need.

The last part of the question deals with who determines the adequacy of training. It is my belief that the adequacy of training is a direct result of the amount of concern felt by school administrators and university professors for an area of study not as significant in terms of national and state priorities as the sciences or the language arts. It is also my belief that the adequacy of training is determined by the amount of concern for family life education that the local boards of education sense in their school districts. To improve the adequacy of training, it will be necessary to create a concern within the university and develop a belief

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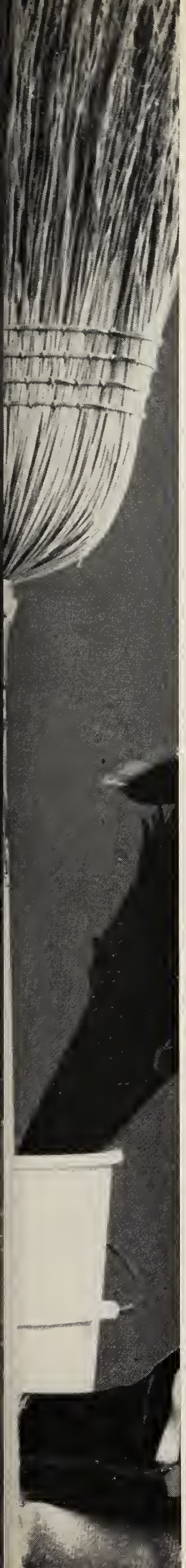
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These side reactions, noted with related compounds, are not yet reported: paradoxical excitation with severe rage reactions, hallucinations, menstrual irregularities, change in EEG pattern, blood dyscrasias (including agranulocytosis), blurred vision, diplopia, incontinence, stupor, disorientation, fever, euphoria and dysmetria.

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and desire on the part of various departments within the university. These departments will have to visualize themselves as setting the pace toward strengthening family life education as an interdepartmental partnership.

REV. ROBERT FREARS, ASSOCIATE DIRECTOR, MICHIGAN COUNCIL OF CHURCHES

Discussions about the meaning of human sexuality and its fulfillment within and between the churches continue to go on.

I would like to call to the attention of Michigan physicians a portion of the fine article by William H. Genne, B.A., M.A., Director of the Commission on Marriage and Family Life with the National Council of Churches of Christ in the USA, in the *SIECUS Newsletter,* Volume 2, Number 3. The *Newsletter* is the publication of the Sex Information and Education Council of the U. S.

Reverend Genne wrote: "Practically all the discussions within and between the churches have recognized the moral responsibility of family planning." The cutting edges regarding birth control are now on the questions 'Should the state provide birth control services to unmarried mothers?' and 'Should birth control services be provided to unmarried persons?' The movement seems to be toward the protection of the baby from being born unwanted and rejected by its parents and by society. There is agreement that a baby should not be regarded or used as punishment for the mother.

"With regard to sex education, all of the major faith groups have accepted this responsibility and are strengthening their programs and leadership in this area. Even churches which pride themselves on being more conservative such as the Southern Baptist and the Lutheran Church—Missouri Synod—are consulting with nationally recognized experts in the development of their programs.

"The recent Joint Statement on Marriage and Family Life in the United States, adopted by the National Catholic Welfare Conference, the National Council of Churches, and the Synagogue Council of America, states their commonly held affirmations about sex, marriage, parenthood and family life. This statement is offered as a stimulus to interfaith cooperative activity in local communities and commits them to work with all men of good will.

"One implication of this statement is that school teachers and administrators can count on more support and cooperation of all these faith groups in any responsible effort to provide a base of study in sex education for the total community.

"There is an explosive quality about the growth of the human spirit as it seeks to comprehend new knowledge and to discover new meanings in the rapidly developing events of today's world.

"The world, as Pilate of old, keeps asking 'What is truth?' (i.e. What is accurate interpretation and wise evaluation of the meanings in the facts embodied in our research data?)

"What the communities of faith are striving to discover are the new meanings in the facts that God has revealed in response to the searchings of the scientific mood of the human spirit. At the recent North American Conference on Church and Family, the theologians agreed that it would take from fifty to seventy-five years to assess the impact of our new scientific knowledge on our moral responsibilities in the realm of sex, marriage, and family life.

"The SIECUS Charter states its Purpose to be '*to establish man's sexuality as a health entity.*' The theologian would respond that from all we know in human history and personal experience, God has established sexuality as a health entity as part of His Creation. The job of SIECUS, and of every person, is to discover what that means and how to act to fulfill that meaning."

Here Is Joint Statement On Marriage, Family Life By Religious Councils

NATIONAL CATHOLIC WELFARE CONFERENCE
Family Life Bureau

NATIONAL COUNCIL OF THE CHURCHES OF CHRIST IN THE U.S.A.
Commission on Marriage and Family

SYNAGOGUE COUNCIL OF AMERICA
Committee on the Family

Keenly aware of the role religion ascribes to the home and family life and keenly aware of the powerful and pervasive social conditions which threaten to undermine human dignity, marriage and family life in America, we, as representatives of the major religions—Catholic, Jewish, Orthodox, and Protestant—wish to bring the religious teachings of our respective faiths to bear upon our society and to join with all men of good will to create a healthier social climate in which family life in America can flourish and be strong.

There are large areas of agreement and numerous possibilities for joint programs and action, although we recognize and respect the differences of approach, emphases and contributions of each major faith.

To help families develop foundations for personally meaningful and socially responsible behavior, we offer the following affirmations on which our historic faiths unite.

"We believe, and unite in affirming, that God, the Creator of the Universe and the Father of all mankind, did create us male and female and did establish families as part of His Divine Plan. Because of our understanding of this plan, we believe and unite in affirming that our sexuality is a wondrous gift from God to be accepted with thanksgiving and used within marriage with reverence and joy.

"We believe and unite in affirming that our understanding of God's plan for marriage ideally calls for lifelong commitment in fidelity to a continuing, supportive relationship in which each partner helps the other to develop to fullest capacity. We are united in our belief that God is an active partner in sustaining and enriching the husband-wife relationship in marriage.

"We believe and unite in affirming that children are a trust from God and that parenthood is a joyous, though strenuous, adventure in partnership with God for the procreation and nurturing of each child. Parenthood calls for the responsible use of all our God-given talents and abilities in this adventure.

"We believe and unite in affirming that family life is the cradle of personality and character for each child and creates an environment for the societal values of each succeeding generation as well as the principal source of meaningful personal relations for each adult member of our society. All children need a father and a mother firmly united in love to guide their growth into manhood or womanhood and to provide the emotional security that fosters development toward mature and responsible relationships between men and women.

"We believe that the family is the cornerstone of our society. It shapes the attitudes, the hopes, the ambitions, the values of every citizen. The child is usually damaged when family living collapses. When this happens on a massive scale, the community itself is crippled."

There are no easy answers to all the complex problems facing marriage and family living in the world today, and we are aware that there are many fronts on which we must work. We can never finish the task; neither are we free to ignore it.

Therefore, we the major religious groups in the U.S., join forces in exploring all ways and means available to preserve and strengthen family life in America to the end that each person may enjoy fulfillment in dignity, justice, and peace.

July 8, 1966

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MICHIGAN YOUTH COMMISSION WANTS MORE ADEQUATE SEX EDUCATION PROGRAM

The Michigan Youth Commission recently made a policy statement on the needs for expanded sex education. The statement presented to the Governor and the Lieutenant Governor for the Michigan Human Resources Council declared that "the quality and extent of sex education received by our youth, especially in our schools, is grossly inadequate."

The Youth Commission further declared:

"The members of the Michigan Youth Commission, consisting of representatives of the medical, nursing, teaching, legal, social work, youth work and related professions, of business and labor, of clergy and citizen leaders, are agreed that the quality and extent of sex education received by our youth, especially in our schools, is grossly inadequate.

"A recent survey of the youth members (composed of representative delegates from major youth organizations) of the Youth Advisory Council to the Michigan Youth Commission shows that youth themselves do not feel that they are receiving adequate sex education. Only one youth responded that the information he received really met his needs. While they pointed out that the home, the church, the youth group and the school all have a part in preparing young people for mature adult roles, there was general agreement that the school was the place they should receive proper sex education. Formal discussions at two different conferences of the Youth Advisory Council on venereal disease, led by a medical doctor, emphasized the many questions our youth have about sex and their desire to receive proper information, primarily in the schools. Thus, almost all of them agreed that information about venereal disease should be given in the schools, possibly between the ages of 10-13 to be effective.

"All students want education about reproduction, starting in the fifth grade and continuing through senior high school. Yet only 50% of the Youth Advisory Council members reported having a definite unit on reproductive education. The Youth Advisory Council members were unanimous in agreeing that classes in family life education were very essential, yet only a few of them remember having such a class or remember its content if they did have one.

"The Youth Advisory Council members through their responses in the questionnaire and the many searching questions addressed to the representative of the medical profession who discussed venereal disease with them made known their views very clearly and very pointedly.

"They also emphasized, however, that the teachers, nurses and physicians who have the responsibility for the instruction, must be mature, knowledgeable, feel comfortable in their role, and be willing to answer truthfully and fully all questions asked by students."

CHALLENGES NEWSPAPERS

"Newspapers are no longer in the transmitting business, but in the education business. In fact, the mass communications of this country probably have more effect on the American mind than all the schools and universities combined, and the problem is that neither the officials who run the government nor . . . the newspapers, nor the radio and television news programs, have adjusted to that fact."

James Reston

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Aspirin (2½ gr.)	162.0 mg.
Phenacetin (3 gr.)	194.0 mg.
Hyoscyamine sulfate	0.031 mg.
Codeine phosphate	¼ gr. (No. 2), ½ gr. (No. 3), 1 gr. (No. 4)
(Warning: may be habit forming)	

Contraindications: Hypersensitivity to any ingredient.

Precautions: As with all phenacetin-containing products, avoid excessive or prolonged use.

Side Effects: Side effects are uncommon—nausea, constipation, and drowsiness have been reported.

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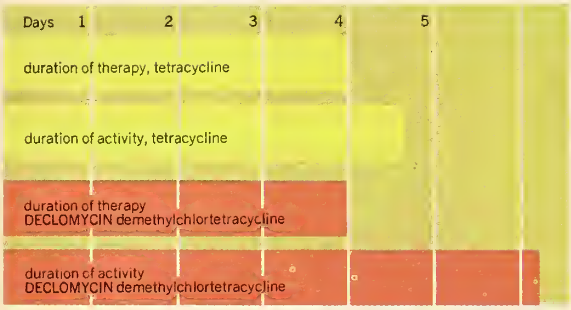

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after the last dose to protect against relapse

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Contraindication—History of hypersensitivity to demethylchlortetracycline.

Warning—In renal impairment, usual doses may lead to excessive systemic accumulation and liver toxicity. Under such conditions, lower than usual doses are indicated and, if therapy is prolonged, serum level determinations may be advisable. A photodynamic reaction to natural or artificial sunlight has been observed. Small amounts of drug and short exposure may produce an exaggerated sunburn reaction which may range from erythema to severe skin manifestations. In a smaller proportion, photoallergic reactions have been reported. Patients should avoid direct exposure to sunlight and discontinue drug at the first evidence of skin discomfort.

Precautions and Side Effects—Overgrowth of nonsusceptible organisms may occur. Constant observation is essential. If new infections appear, appropriate measures should be taken. Use of demethylchlortetracycline during tooth development (last trimester of pregnancy, neonatal period and early childhood) may cause discoloration of the teeth (yellow-grey-brownish). This effect occurs mostly during long-term use but has also been observed in short treatment courses. In infants, increased intracranial pressure with bulging fontanels has been observed. All signs and symptoms have disappeared rapidly upon cessation of treatment. Side reactions include glossitis, stomatitis, proctitis, nausea, diarrhea, vaginitis and dermatitis. If adverse reaction or idiosyncrasy occurs, discontinue medication and institute appropriate therapy. Anaphylactoid reactions have been reported.

Average Adult Daily Dosage: 150 mg q.i.d. or 300 mg b.i.d. Should be given 1 hour before or 2 hours after meals, since absorption is impaired by the concomitant administration of high calcium content drugs, foods and some dairy products.

Capsules: 150 mg; *Tablets:* film coated, 300 mg, 150 mg, and 75 mg of demethylchlortetracycline HCl.

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  The soft, easily propelled bulk created by Metamucil allows comfortable elimination with a minimum of effort and irritation.

- **Softens stools...**

  Metamucil absorbs water and creates a soft, pliant fecal mass which is demulcent to mucosal surfaces.

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  Metamucil provides "smoothage" to prevent the formation of scybalous concretions and to lessen painful tenesmus.

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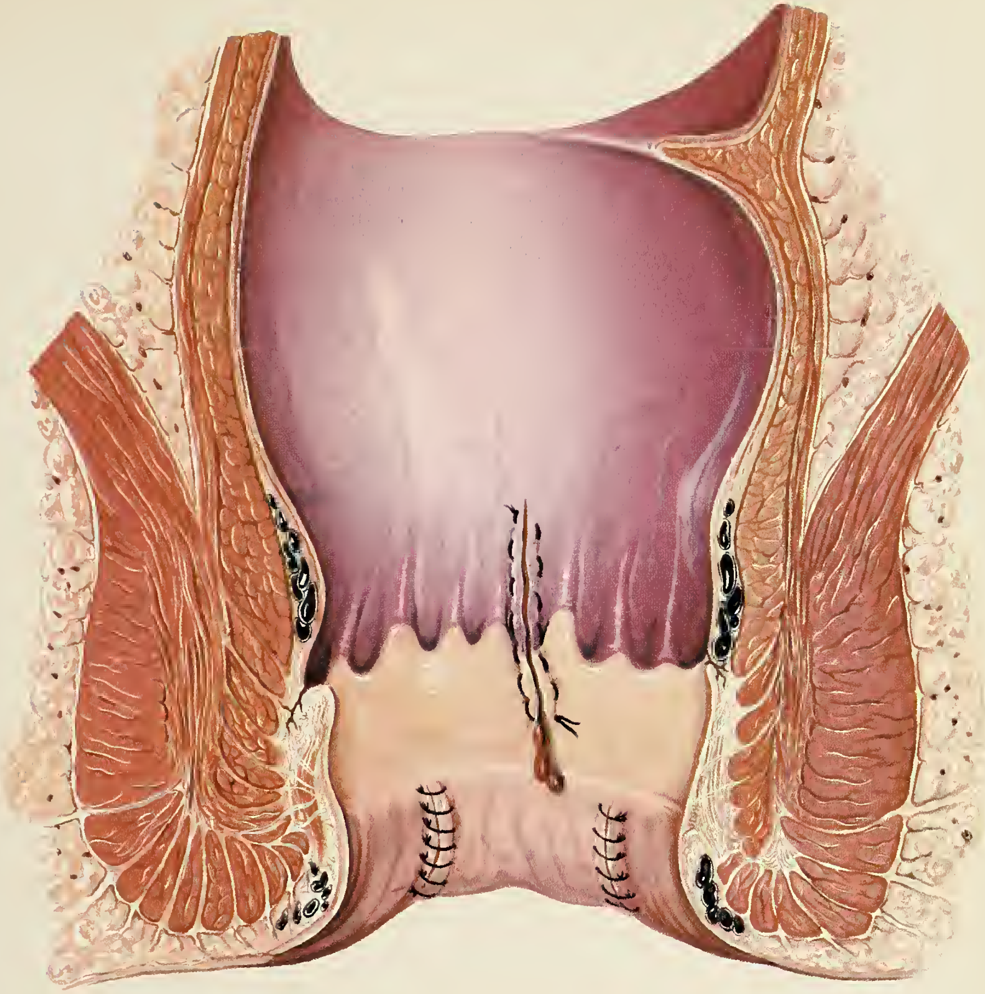

Usual Adult Dosage:

One rounded teaspoonful of Metamucil powder in a glass of cool liquid, or one packet of Instant Mix Metamucil in a glass of water. An additional glass of liquid is helpful.

Metamucil powder contains equal amounts of refined, purified psyllium and dextrose furnishing 14 calories and a negligible amount of sodium in each dose; available in containers of 4, 8 and 16 ounces.

Instant Mix Metamucil furnishes 3 calories and 0.25 Gm. of sodium in each dose; available in cartons of 16 and 30 single-dose packets.

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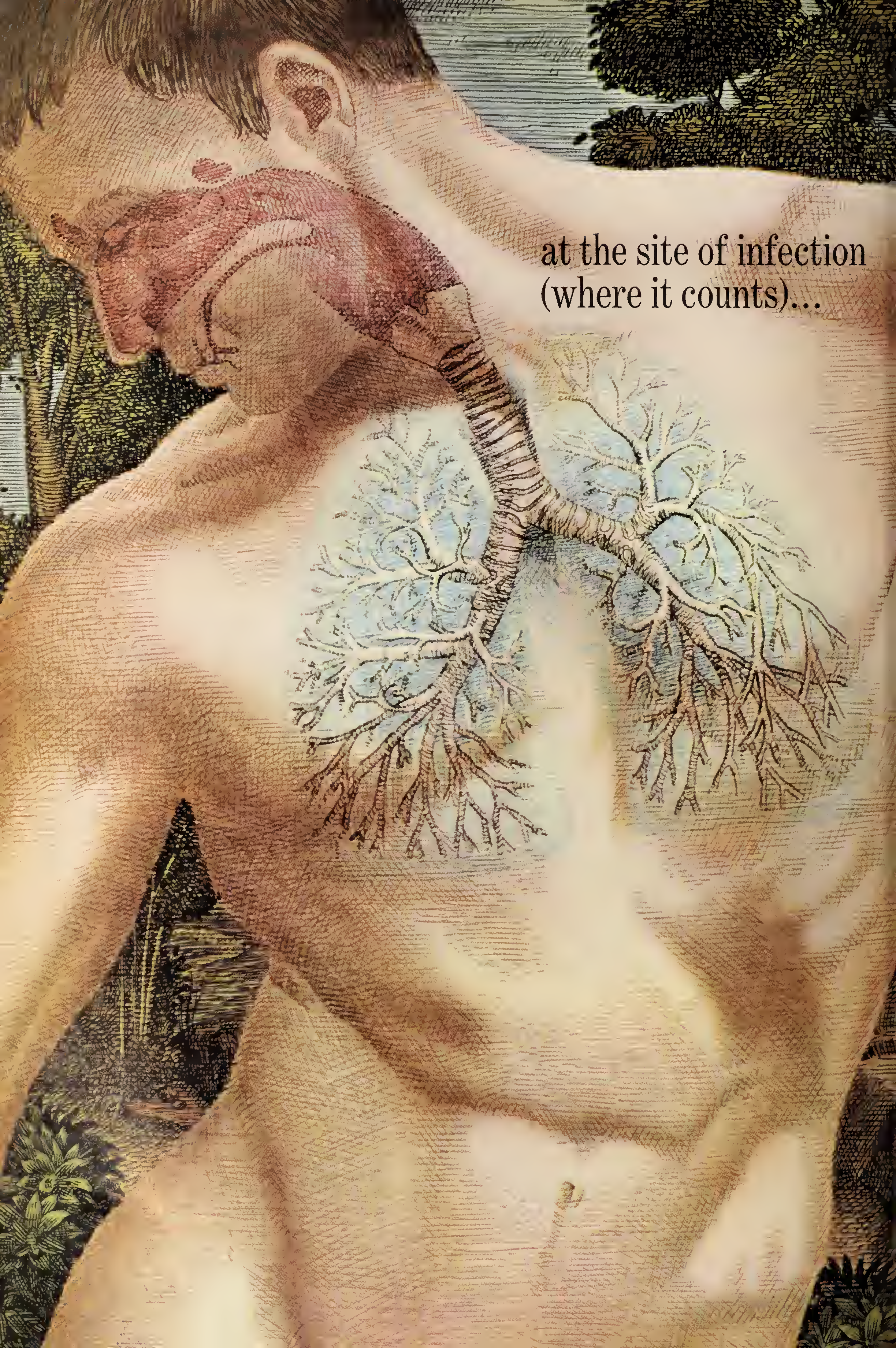

at the site of infection
(where it counts)...

Ilosone® provides more antibacterial activity than any other oral erythromycin

Acid stable, better absorbed... Ilosone produces faster, higher, more prolonged blood levels, even in the presence of food[1-3]

Because it is the most active form of oral erythromycin, Ilosone can help assure consistently greater antibacterial activity at the site of infection. Ilosone produces peak antibacterial blood levels two to four times those of other erythromycin preparations.[1,2] Not only are these levels attained earlier, but they are maintained for much longer periods. Even the presence of food does not seem to affect the activity of Ilosone.[1,3]

In the treatment of patients with bacterial infections susceptible to erythromycin, Ilosone has compiled an excellent therapeutic record. Since it exerts its greatest activity against gram-positive organisms, it is particularly useful in common respiratory and soft-tissue bacterial infections. Ilosone kills—not merely inhibits—streptococci, pneumococci, and more strains of staphylococci than any other macrolide antibiotic. This bactericidal action, coupled with the high antibacterial levels attained, makes Ilosone especially valuable in patients with low host resistance, such as infants, debilitated individuals, and diabetics.

Ilosone has shown no cross-resistance with penicillin and may be effective against organisms that have become resistant to that agent. Despite its high antibacterial activity, Ilosone has demonstrated a low incidence of side reactions. Blood dyscrasias, ototoxicity, and tooth staining have not been observed. Infrequent cases of drug idiosyncrasy, manifested by a cholestatic jaundice, have occurred, but there have been no known definite residual effects.

700121

Ilosone®

Erythromycin Estolate

Lilly

(See next page for prescribing information.)

Ilosone®/the most active oral form of erythromycin

Description: Ilosone is the most active form of oral erythromycin that has been developed. Because it is stable in acid, well absorbed, and excreted in lesser amounts in the bile, it provides faster, higher, and longer-lasting levels of antibacterial activity (ABA) in the serum, even when taken with food, than do comparable doses of erythromycin.

Indications: Ilosone is indicated in infections caused by microorganisms sensitive to its action (especially staphylococci, hemolytic streptococci, and pneumococci). The drug is therefore useful in a high proportion of bacterial diseases encountered in clinical practice and particularly in the treatment of bacterial infections of the upper and lower respiratory tract and soft tissues.

In the treatment of acute bacterial pharyngitis and tonsillitis, this antibiotic has promptly eradicated the bacteria (streptococci) and has produced a parallel prompt clinical improvement. There have been no group A beta-hemolytic streptococci resistant to this preparation. In beta-hemolytic streptococcus infections, treatment should be maintained for ten days to prevent the development of rheumatic fever or glomerulonephritis.

Erythromycin estolate has proved to be very effective in pneumococcus pneumonia and in acute bronchitis with pneumococci on culture. Bronchopneumonia and otitis media in children have responded well to its use.

The antibiotic has been used very successfully in staphylococcus infections. Good therapeutic results have been obtained in soft-tissue infections, abscesses, cellulitis, carbuncles, wound infections, and furunculosis.

In serious staphylococcus infections, erythromycin preparations should be used only in combination therapy with other antimicrobial agents. As is the case with any treatment regimen used in these severe conditions, surgical procedures should be performed when indicated, and large dosages of the antimicrobial agents should be employed. In this fashion, Ilosone has been effective in staphylococcus pneumonia, osteomyelitis, septicemia, empyema, and meningitis.

Multiple 500-mg. doses of the drug have been useful in gonorrhea and syphilis. Since penicillin is the drug of choice for the treatment of syphilis and gonorrhea, erythromycin estolate should be employed for these infections only in patients with a history of penicillin allergy. Also, other infections due to susceptible bacteria in patients known to be hypersensitive to penicillin or other antibiotics may be considered for treatment with Ilosone.

Contraindications: Ilosone is contraindicated in patients with a known history of sensitivity to this drug and in those with preexisting liver disease or dysfunction.

Side-Effects: Data obtained from seven years' use of propionyl erythromycin ester and erythromycin estolate (Ilosone) indicate that hepatic dysfunction with or without clinical jaundice may occur during or following courses of therapy with the drug.

Changes in liver function tests in such cases have been indicative of intrahepatic cholestasis. The symptoms appear to be the result of a form of sensitization. The initial symptoms have appeared in some cases after a few days of treatment but generally have followed one or two weeks of continuous therapy or several courses of the drug. Symptoms reappear promptly if the drug is readministered to sensitive patients, usually within forty-eight hours. Eosinophilia was noted in peripheral blood counts. The findings readily subsided without apparent residual effects when treatment was discontinued. Recovery was delayed in one reported instance. The physician indicated in this case that either drug-induced jaundice or viral hepatitis may have been responsible for the findings.

In one clinical study involving ninety-three patients treated with the antibiotic, three cases of jaundice were observed and an additional eleven cases developed some changes in liver function tests. Three of the patients had abnormal liver function tests a second time on readministration of the drug.

Even though it is assumed that not all cases of jaundice have been reported, it seems clear that the number is small compared with the amount of drug that has been used. Reported cases have included persons in whom there had been administered other drugs known to be associated at times with hepatic side-effects and cases in which the presence of viral hepatitis or other disease may have been responsible for the findings. In some of the cases, associated gastro-intestinal symptoms simulated the colic of biliary tract disease. In other instances, clinical symptoms and results of liver function tests resembled findings in extrahepatic obstructive jaundice. It appears that the occurrence of jaundice after administration of Ilosone is infrequent, but further investigations are being made to estimate its incidence more accurately.

In those cases mentioned above in which jaundice appeared to be definitely related to use of the drug, laboratory findings we
characterized by increased direct-reacting bilirubin, elevat
alkaline phosphatase levels, negative or weakly positive cephal
flocculation and thymol turbidity tests, elevated serum glutam
oxalacetic transaminase levels, peripheral eosinophilia, and no
mal cholecystograms.

Individual idiosyncrasy seems evident since jaundice has n
been reported in other patients taking prolonged courses of t
medication. Patients with chronic infection have been given 1
to 2 Gm. of the drug daily for periods of two to six months, a
patients with rheumatic fever have taken prophylactic doses
0.5 Gm. daily for two years without difficulty. In one group
144 patients who received the drug daily for two years, no jau
dice was noted. It was of interest that members of six of the
patients' families, who were not taking the drug, had episod
of jaundice during the study period.

Transaminase and serum alkaline phosphatase levels we
determined in a group of fifty-four adults and children who to
250 mg. of Ilosone daily for an average of sixteen months
rheumatic fever prophylaxis. The results were compared wi
those of a similar group of forty-four patients who received pe
icillin. There were no cases of jaundice in either group. Elevati
of SGPT and serum alkaline phosphatase levels during the cour
of treatment was observed in one patient treated with Iloso
and in two patients treated with penicillin. Seven other patie
in the group receiving Ilosone and four others in the penicill
group showed elevations in one of the tests at some time duri
administration of the drugs.

Very satisfactory therapeutic results, without toxicity, we
reported in 102 pediatric patients who received short-term (te
day) courses of Ilosone in the treatment of streptococcus infe
tions. Results of liver function tests in these patients were co
parable to those in a similar control group who had receiv
penicillin.

Gastro-intestinal disturbances not associated with hepatic e
fects are observed in a small proportion of individuals as a resu
of a local stimulating effect of the medication on the alimenta
tract; however, the normal intestinal gram-negative bacteri
flora is not appreciably altered by erythromycin drugs.

Although allergic manifestations are uncommon with the u
of erythromycin, there have been occasional reports of urticari
skin eruptions, and, on rare occasions, anaphylaxis.

Administration and Dosage: Ilosone is administered orally.

Ilosone Pulvules®
Ilosone Chewable Tablets
Ilosone Drops
Ilosone, 125, for Oral Suspension

For infants and for children under twenty-five pounds of bod
weight, the usual dosage is 5 mg. per pound every six hours; f
children twenty-five to fifty pounds, 125 mg. every six hour
(Tablets Ilosone Chewable should be chewed or crushed an
swallowed with water.)

For adults and for children over fifty pounds, the usual dosa
of Ilosone is 250 mg. every six hours.

For severe infections, these dosages may be doubled.

When larger doses are indicated, parenteral erythromyc
therapy should be considered.

In the treatment of syphilis, the recommended total dosage
20 to 30 Gm. given in divided doses for a period of ten to fiftee
days. Close follow-up of the patient is necessary since erythr
mycin drugs have not had adequate evaluation in all stages
syphilis. Examinations of spinal fluid are recommended as pa
of the follow-up therapy.

For gonorrhea, 500 mg. four times a day for four days a
recommended.[3] In the treatment of gonorrhea, patients with
suspected lesion of syphilis should have a dark-field examinatio
before receiving antibiotics, and monthly serologic tests shoul
be made for a period of three months.

How Supplied: Pulvules Ilosone, Capsules, N.F., 125 and 250 m
(equivalent to base), in bottles of 24 and 100.

Tablets Ilosone Chewable, N.F., 125 mg. (equivalent to base)
in bottles of 50.

Ilosone Drops, 5 mg. (equivalent to base) per drop, in 10-cc
size packages, with dropper calibrated at 25 and 50 mg.

Ilosone, 125, for Oral Suspension, N.F., 125 mg. (equivale
to base) per 5-cc. teaspoonful, in 60 and 150-cc.-size package

References: 1. Griffith, R. S., and Black, H. R.: Am. J. M. Sc., *247*:69, 196
2. Griffith, R. S., and Black, H. R.: Antibiotics & Chemother., *12*:398, 196
3. Hirsch, H. A., Pryles, C. V., and Finland, M.: Am. J. M. Sc., *239*:198, 1960.

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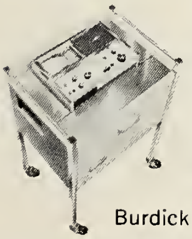

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VOICES POINT OF VIEW OF PRIVATE SECTOR

EXCERPTED FROM ADDRESS BY AMA PRESIDENT HUDSON AT DETROIT ECONOMIC CLUB

"The medical profession is no different from any of America's businesses, industries or other professions. If industry, for example, should lose its freedom and be forced to operate under onerous restrictions and regulations which effectively, if not entirely, eliminate incentive for improvement, then the past and current stream of new products and better forms of old products will be reduced, at best, to a trickle.

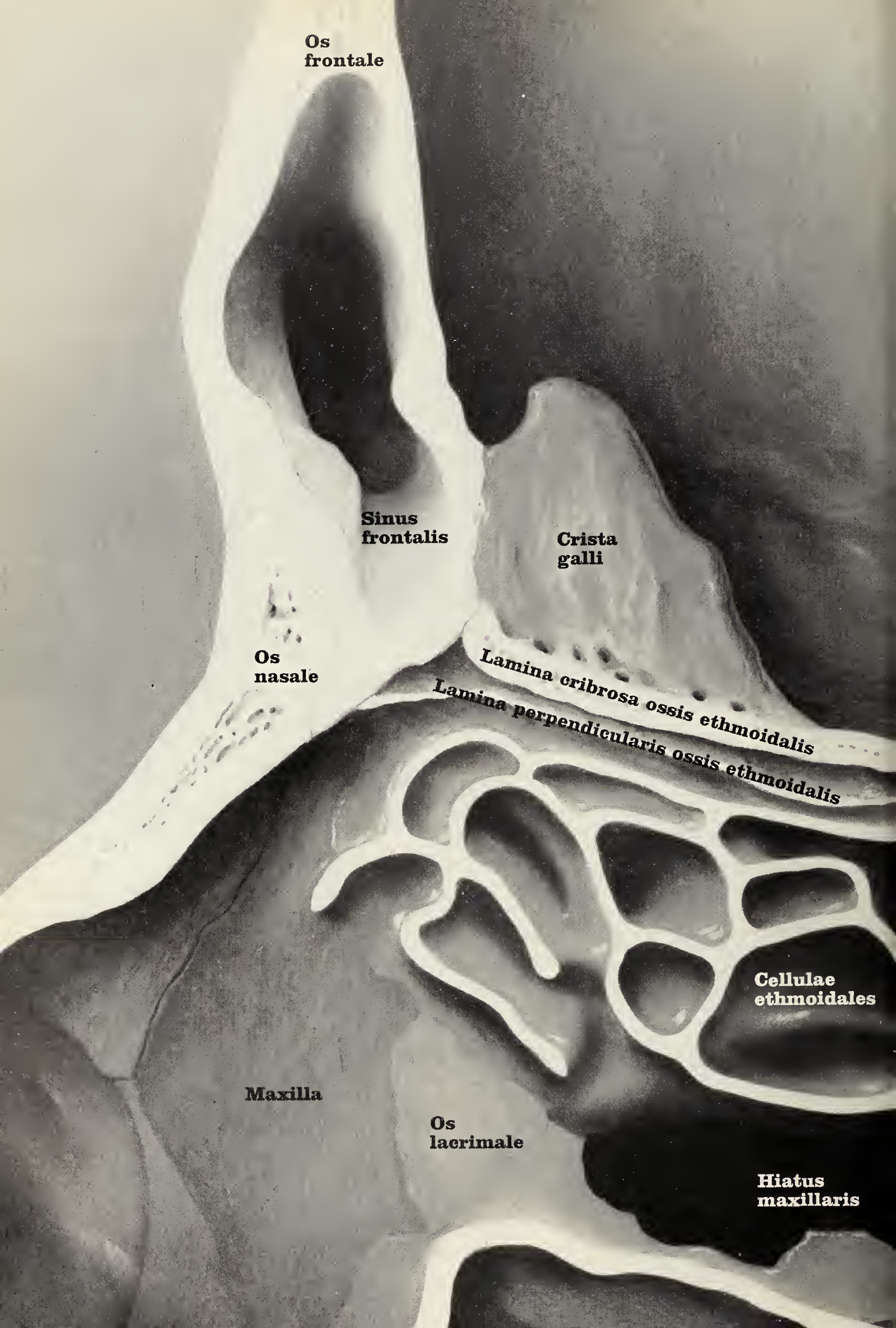
"Advances in medicine, as in business, have come about through the individual's search for a better way, a search supported and encouraged by those for whom or with whom he works. And let's be perfectly honest with one another: That search and its support have been motivated, at least to a large extent, by the knowledge that there are rewards under free enterprise for the person, for the company, for the institution, or for the occupation or profession that finds newer and better ways to do a job, to provide service, or to make a product.

"If the hope of reward is removed or substantially diminished, by the acceptance or enforcement of socialistic thinking, then the search for innovation will end.

"I am not predicting the future predominance of such thinking. In spite of indications to the contrary, I remain optimistic — more optimistic, I might add, than many of my professional colleagues and more than many of my friends in business — that the wave of the future for our land is not socialism, but an increased vitality of freedom.

"If that optimistic outlook is to be justified, however, all of us who are in the private sectors of professionalism or business must redouble our efforts to meet the needs of this nation and of its people.

"I do not urge that government abandon all of its hopes and all of its programs for helping the people of this country who need help. I do, however, urge that in its zeal for building a great society — or a better overall condition for all citizens, under whatever title is appropriate — the government not assume direct managerial responsibility, but, instead, that government concentrate on maintaining a climate of laws, taxes, and other elements of economy and society which both permits and encourages the most effective possible activity by the private sectors."


Os frontale
Sinus frontalis
Crista galli
Os nasale
Lamina cribrosa ossis ethmoidalis
Lamina perpendicularis ossis ethmoidalis
Cellulae ethmoidales
Maxilla
Os lacrimale
Hiatus maxillaris

Sinus headache is not a single entity, but a chain reaction of pain. It is facial pain—deep, dull, aching and nonpulsating. It is referred pain—originating in the nose and sinuses but felt at another site. It may become generalized pain and tension in head and neck. It is one or all of these. The Sinutab formula is designed for symptomatic relief of sinus headache. It provides two analgesics to relieve pain and discomfort...an effective oral decongestant to reduce mucosal congestion...and an antihistamine to help control allergic manifestations. *Side Effects:* Epigastric distress, drowsiness, dizziness, insomnia and nervousness. *Precautions:* Instruct patients not to drive or operate machinery if drowsiness occurs. Use with caution in patients with thyroid disease, heart disease, hypertension, diabetes or kidney disease. Excessive dosage or prolonged use may cause kidney damage. *Dosage:* Adults—2 tablets every 4 hours.

special formula for a special problem

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for sinus headache

Each tablet contains
150 mg. acetaminophen,
150 mg. phenacetin,
25 mg. phenylpropanolamine HCl,
and 22 mg. phenyltoloxamine citrate.

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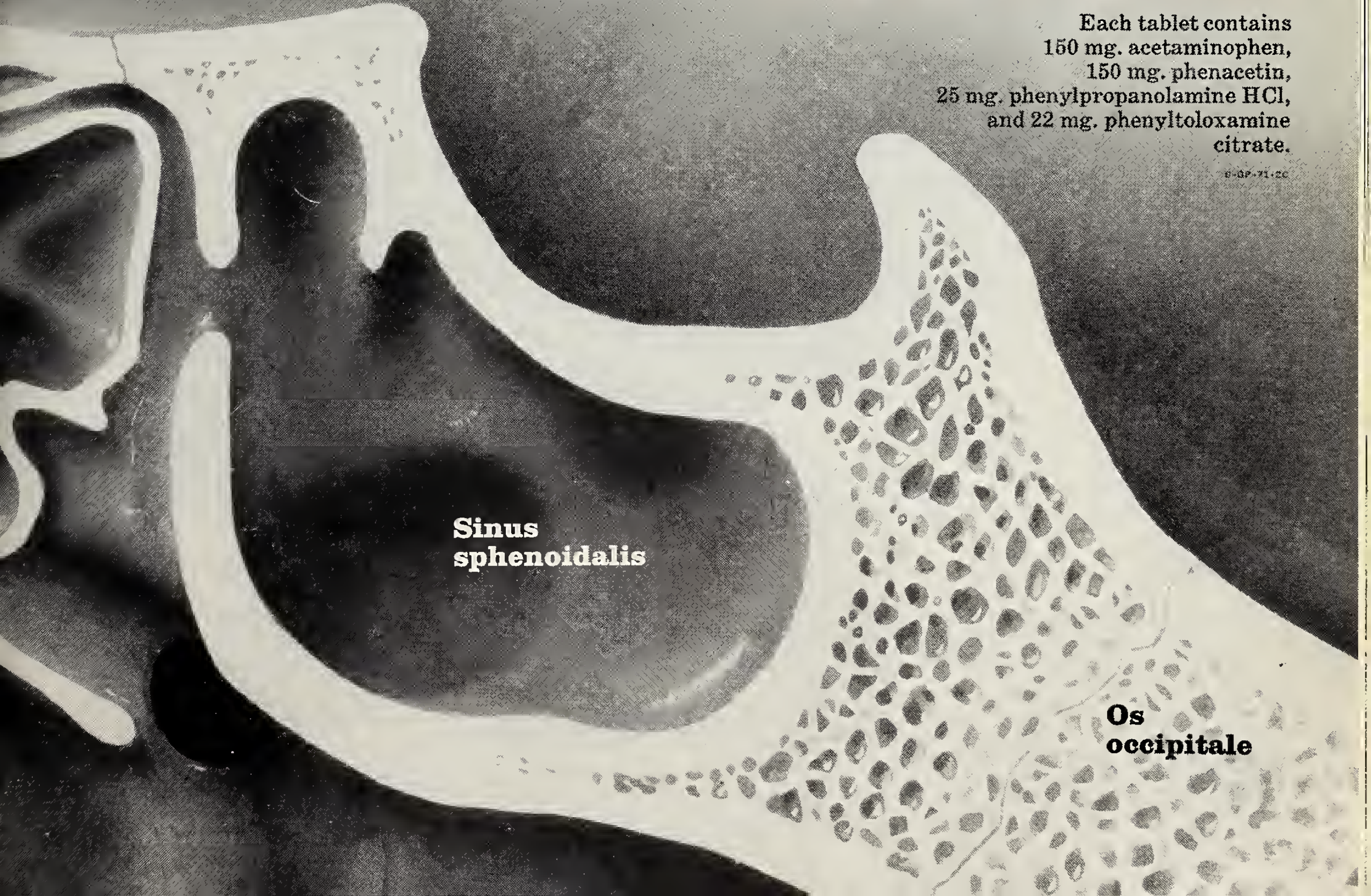

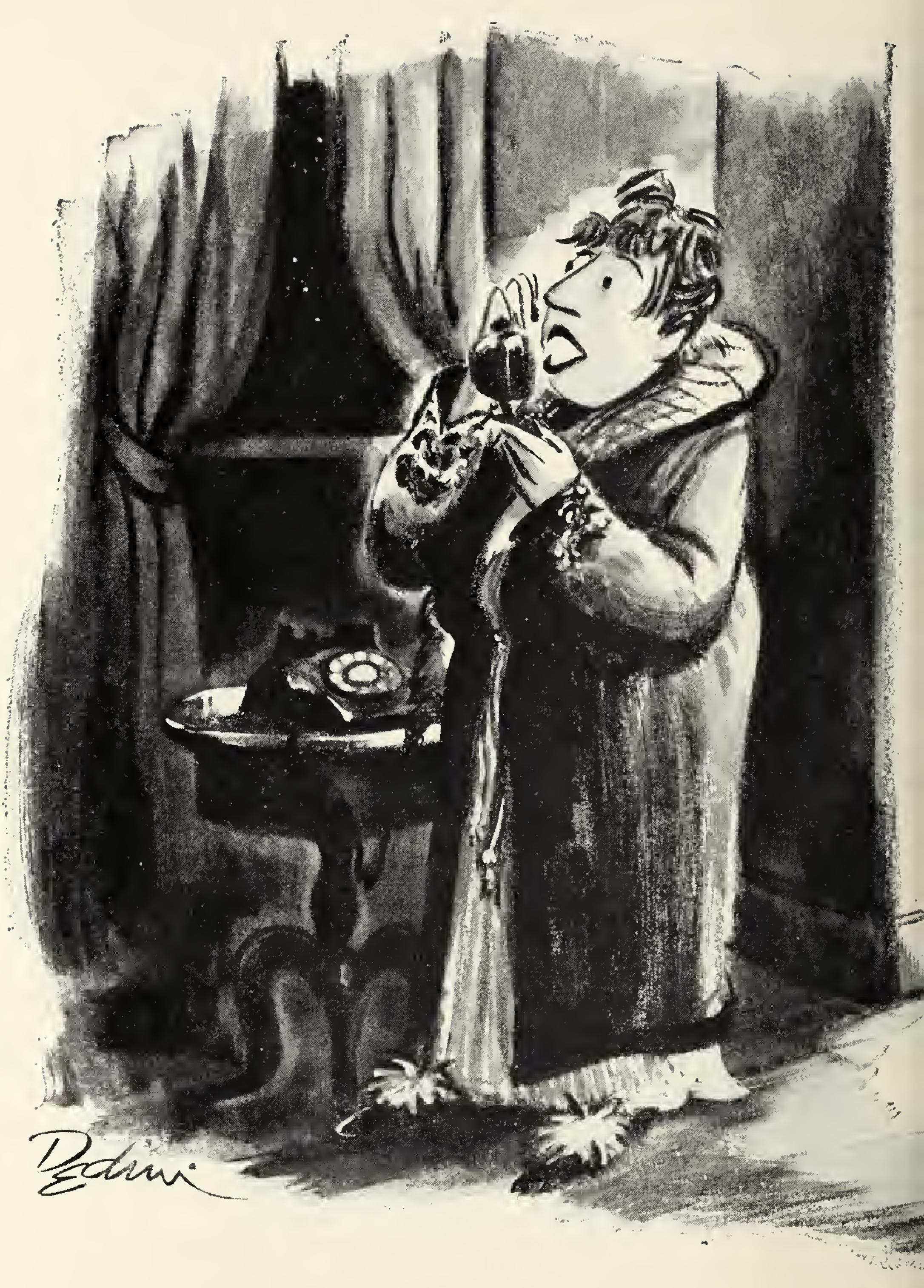

"George wants to know if it's okay to take his cold medicine now, Doctor, instead of seven o'clock?"

The long-continued action of Novahistine LP should help you both get a good night's sleep. Two tablets in the morning and two in the evening will usually provide round-the-clock relief by helping clear congested air passages for freer breathing. Novahistine LP also helps restore normal mucus secretion and ciliary activity—normal physiologic defenses against infection of the respiratory tract. Use cautiously in individuals with severe hypertension, diabetes mellitus, hyperthyroidism or urinary retention. Caution ambulatory patients that drowsiness may result. Each Novahistine LP tablet contains: phenylephrine hydrochloride, 25 mg., and chlorpheniramine maleate, 4 mg.

NOVAHISTINE® LP

DOW **PITMAN-MOORE** Division of The Dow Chemical Company, Indianapolis

Original Scientific Article

Dental Staining Due To Tetracycline Administration

BY DONALD M. SMITH, D.D.S.
LLOYD H. STRAFFON, D.D.S.
BOTH OF ANN ARBOR

The increased incidence of dental staining following the administration of tetracycline drugs has become a point of concern to the dentist and his young patients in recent years. Although other causes of intrinsic dental staining have been observed and studied, the tetracyclines have been reported as a new etiologic factor and are implicated as a major cause.[11]

The primary teeth are beginning to calcify in the fetus at about the fourth month of gestation, while the permanent teeth begin calcification just before or soon after birth and continue until about the eighth year. In stained teeth the area of tetracycline discoloration corresponds to that part of the tooth which was forming at the time the drug was administered. Due to the peculiarities in the morphology of tooth formation, a single incremental stain within the tooth does not appear as a narrow band externally. Rather it is a diffuse discoloration within a general region of either the primary or the permanent tooth.

Thus, repeated administrations of a staining material do not appear as bands on the tooth. Histologically, however, by fluorescence with ultraviolet light, these incorporated drugs can be demonstrated as forming definite incremental bands corresponding to the dosages and times of administration of the tetracycline drug.[2, 4]

Tetracyclines are firmly bound to calcifying regions of the body, but in the teeth this bond is permanent. Thus, the stain is permanent and the affected teeth can only be treated by coverage with full crowns. One characteristic of these drugs is that upon exposure to light they oxidize and subsequently darken in color from their usual yellow hue to a grey or grey-blue-brown discoloration.[6] As the color darkens the fluorescence diminishes.[13]

Several studies have reported that dental staining can be traced to tetracycline drugs in 70% to 90% of the children investigated.[13] One extensive study has shown that dental staining occurred in 2.3% of a population of children ranging in age from five to nine years.[3] In a pediatric practice the incidence of tetracycline staining was found to be around 27%.[16, 7]

Other studies have shown that tetracyclines cross the placental barrier.[4, 9] In addition, the teeth of babies born to mothers receiving these drugs during the crucial period of dental development show varying degrees of tetracycline staining and fluorescence.[12] In high doses tetracyclines have been shown to be responsible for hypoplastic defects of the teeth as well as staining.[2, 15, 13] It has been found that the degree of staining depends more on the total dosage of the tetracycline than the duration of administration.[1, 13]

Regardless of the type of tetracycline used, staining of the teeth will occur if it is administered in adequate dosage during the time of tooth development. To include those teeth which would be involved in impaired esthetics, this developmental time period will range from about the fourth month in utero to the sixth or seventh year of life. Within the literature there is reported a wide

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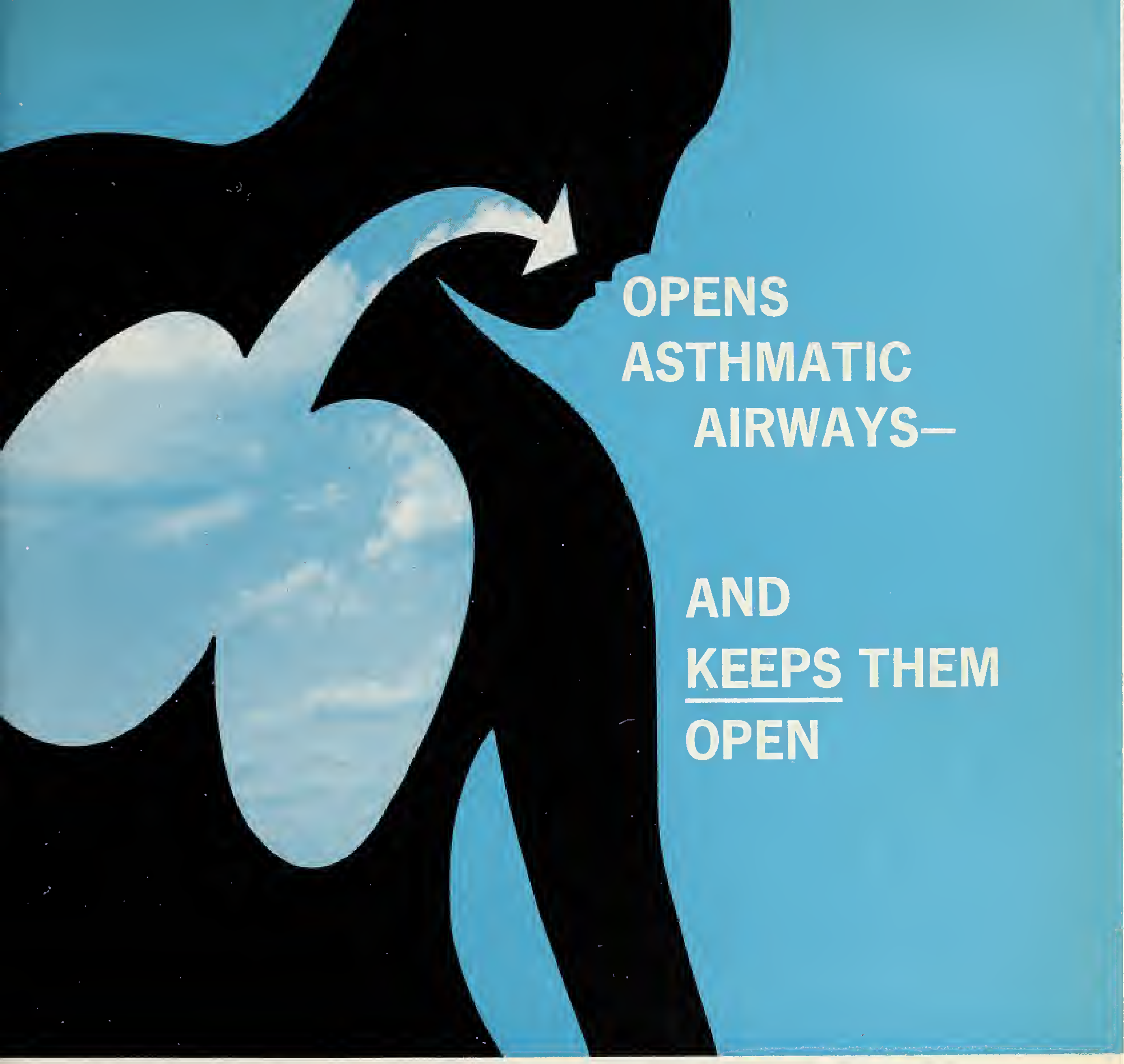
Both Doctor Smith and Doctor Straffon are graduate students in pedodontics at the University of Michigan Dental School. The article appeared in the January 1967 issue of the Journal of the Michigan State Dental Association.



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Dosage: One Numa Dura-Tab every 8 to 12 hours helps keep the asthmatic patient symptom-free all day/all night.

Precautions: Use with caution in cardiovascular or hyperthyroid disease, severe hypertension, circulatory collapse, prostatic hypertrophy, or glaucoma.

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(QUINIDINE GLUCONATE 5 gr.)

range of dental discoloration attributed to the various tetracyclines.[5, 8, 10, 13, 14, 17]

There have been warning labels of dental hazards from the administration of tetracyclines on packages since 1964 and it has been reported that legal suits are in progress.[11] This memorandum is not intended to question the therapeutic values of the tetracycline drugs, but rather to identify the potential which the drugs display in permanently and sometimes severely discoloring primary and permanent teeth. When hypoplasia occurs, the esthetic impairment of the teeth is further exaggerated.

REFERENCES

1. Bevelander, G. and Nakahara, H. The effect of diverse amounts of tetracycline on fluorescence and coloration of teeth. J. Pediat. 68:114-120, 1966.
2. Bevelander, G., Ralle, G. K., and Cohlan, S. Q. Effect of administration of tetracycline on the development of teeth. J. Dent. Res., 40:1020, 1961.
3. Frankel, M. A. and Hawes, R. R. Tetracycline is linked to discoloration of teeth. Med. World News, 4:25, 1963.
4. Harcourt, J. K., Johnson, N. W., and Storey, E. In vivo incorporation of tetracycline in teeth of man. Arch. Oral Biol., 7:431, 1962.
5. Ibsen, K. H., Urist, M. R., and Sognnaes, R. F. Differences among tetracyclines with respect to the staining of teeth. J. Pediat., 67:459, 1965.
6. Lewis, D. W. Tetracycline discoloration of teeth: Review and case reports. J. Canad. Dent. Ass., 30:496, 1964.
7. Margolis, F. J. Personal communication, July 15, 1966.
8. Owen, L. N. The effects of administering tetracyclines to young dogs with particular reference to localization of the drugs in the teeth. Arch. Oral Biol., 8:715, 1963.
9. Rendle-Short, T. J. Letter to the Editor, Lancet, 1:1188, 1962.
10. Scofield, H. H. Effect of tetracycline on dentition. D. of Col. Med. Assn., 34:56-59, Jan. 1965.
11. Soentgen, M. L. and Keitel, H. G. Dental staining, tetracycline induced. Med. Science, 17:57, Jan. 1966.
12. Stewart, D. J. Tetracycline in teeth and bone. Lancet, 1:970, 1962.
13. Wallman, I. S., and Hilton, H. B. Teeth pigmented by tetracycline. Lancet, 1:827, 1962.
14. Weyman, J. The clinical appearances of tetracycline staining of the teeth. Brit. Dent. J., 116:289, 1965.
15. Witkop, C. J., and Wolf, R. O. Hypoplasia and intrinsic staining of enamel following tetracycline therapy. J.A.M.A., 185:1008, 1963.
16. Witkop, C. J., Wolf, R. O., and Mehaffey, H. H. The frequency of discolored teeth showing yellow flourescence under ultra-violet light. J. Oral Therapeutics and Pharm., 2:81, 1965.
17. Zegarelli, E. V., Rosenstein, S., Kutscher, A. H., Fahn, B., Botwick, J., and Silverman, W. Discoloration of the teeth associated with oxytetracycline administration to premature birth children. J. Dent. Child., 30:69, 1963.

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DESOXYN Gradumet

Smooth appetite control plus mood elevation

Typically, the obese patient is a repeat dieter. And with each failure, the task looks more hopeless. Therefore, it is often just as important to lift the mood as to curb the appetite. Desoxyn Gradumet does just that. It gently elevates and sustains the mood. And no other product—amphetamine or non-amphetamine—is more effective in suppressing appetite.

DESBUTAL Gradumet

For patients who can't take plain amphetamine

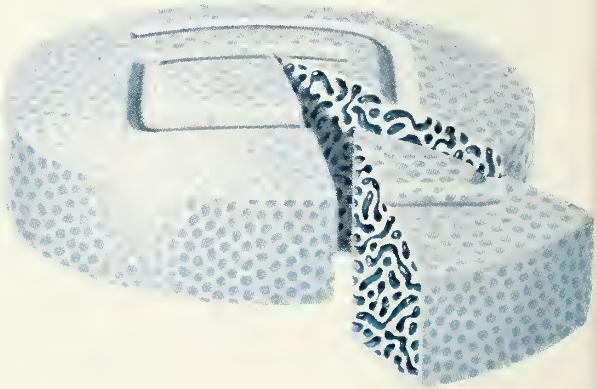
Desbutal Gradumet contains 2 drugs, each in its own tablet section, combined back to back to form a single tablet. One section contains Desoxyn to suppress the appetite and lift the mood; the other contains Nembutal® (pentobarbital) to soothe the patient and counteract any excessive stimulation. The drugs are released in an effective dosage ratio throughout the day.

CONTROLLED-RELEASE

HOW IT DIFFERS FROM LONG-RELEASE

The Gradumet is made up of thousands of interconnecting channels, much like a sponge. These channels—filled with a drug—end at the outer surface of the tablet. When fluid comes in contact with the Gradumet, the drug in the outer ends of the channels dissolves. As the fluid makes its way up the channels, there is a continuous release of medication.

Since the rate of release is rigidly determined by the size and number of channels, the Gradumet is able to provide controlled-release as well as long-release. Patients get a measured amount of medication, moment by moment, throughout the day—from a single oral dose.



THIS IS A RELEASE YOU CAN COUNT ON

THE PROGRAM

WEIGHT CONTROL BOOKLET

To help your obese patients understand why they are overweight—and what they can do about it—Abbott has a booklet called "The Secret of Controlling Your Weight." *It is available to your patients only through you.*

Here is a partial list of the topics covered:

Why you are overweight
Rewards of weight reducing
Balanced meals
Helpful hints
Hunger between meals
Snacks
Weekly weighings
Exercise
Holidays, vacations, special events
Leanness and longevity

Each topic is covered on one page in simple and easy-to-understand language. At the back of the booklet, there is a list of 160 foods showing their caloric content.

the
secret
of
controlling
your weight

FOOD DIARY

The Food Diary is designed to help the overweight patient follow your eating instructions. Space is provided for breakfast, lunch, supper, and even snacks. By writing everything down that's eaten each day, the patient is constantly reminded that she's trying to change her eating habits. And you are furnished with a written record of how well she's doing.

This booklet also lists the caloric content of 160 foods.

See Brief Summary on next page.

THE PRICE

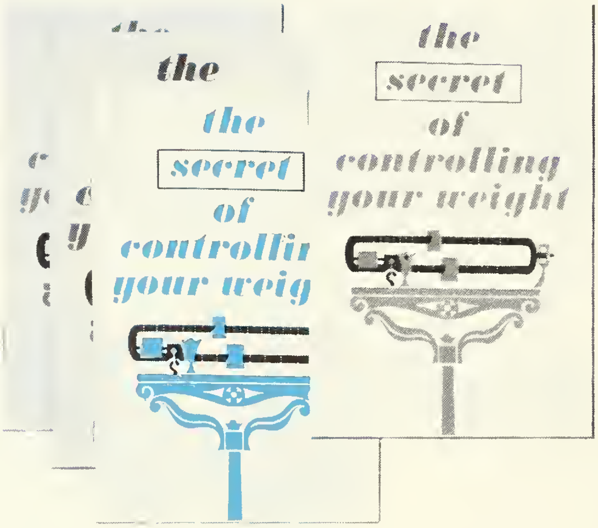
ECONOMY

S	M	T	W	T	F	S
					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30

S	M	T	W	T	F	S
1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
22	23	24	25	26	27	28
29	30	31				

Desoxyn Gradumet and Desbutal Gradumet are so reasonably priced that patients in many cases save enough (compared to other leading long-release anoretics) to get five weeks of medication for the price of four.

FREE SUPPLIES


the secret of controlling your weight

There are four weight control booklets, each with the same text, but with a different sample in the back of the booklet to meet your individual patient's needs. You have your choice of Desoxyn Gradumet in 10 mg. or 15 mg. strengths as well as Desbutal 10 Gradumet and Desbutal 15 Gradumet. The Food Diary is the same for all of the weight control booklets.

Your Abbott man will be happy to supply you with booklets. Just ask him.

CONTRAINDICATIONS: Methamphetamine (in Desoxyn and Desbutal) is contraindicated in patients taking a monoamine oxidase inhibitor. Do not use pentobarbital (in Desbutal) in persons hypersensitive to barbiturates.

PRECAUTIONS, SIDE EFFECTS: Observe caution in patients with hypertension, cardiovascular disease, hyperthyroidism, old age, or those sensitive to sympathomimetic drugs. Prolonged usage may lead to tolerance or psychic dependence. Careful supervision is necessary to avoid chronic intoxication and addiction.

Amphetamine side effects such as a headache, excitement, agitation, palpitation or cardiac arrhythmia usually may be controlled by reducing the dose. Paradoxically-induced depression is an indication to withdraw the drug. Pentobarbital (in Desbutal) may cause skin rash. Nervousness or excessive sedation with Desbutal is usually transient.

Gradumet—Long-release dose form, Abbott: U.S. Pat. No. 2,987,445.

YOUR MSMS DUES

BY BROOKER L. MASTERS, M.D.
MSMS COUNCILOR, FREMONT

The 1966 Michigan State Medical Society House of Delegates passed a $10 dues increase. Your MSMS dues are now $100 per year; indeed a far cry from the $25 per annum a few years ago. There are those who question dues increases, perhaps rightly. There are those who state that the specialty societies have taken over the scientific side of medicine, leaving only the socio-economic phases for the local, state, and national societies.

Objective analysis would reveal the following facts:

(1) The 1966 dues increase was a voluntary act on the part of the House; it appeared to be almost a desire on the part of the delegates to increase participation in the far-reaching events affecting our profession today.

(2) Rather than not participating in the scientific and continuing education phases of medicine, MSMS does participate in the Annual Session which attracts 1500 to 2500 doctors; postgraduate education through the University of Michigan, Wayne State University, and soon Michigan State University; committees such as Maternal Health, Diabetes, Public Health, Cancer, Mental Health, and many more — all active scientific endeavors.

(3) The cost of doing business is going up. Little needs to be added to this statement, but as professionals we must belong to an organization, and it must be a strong one — these cost money.

(4) Part of medicine's problem today is the spintering of its efforts into the many specialty groups, hospital staff programs, etc., so that we do not present a united front. Serious thinkers believe we should reverse this trend and unite all our efforts under one group.

These and all the many details incident to running a business are supported by your one annual dues payment. This $100 provides every MSMS member with effective and necessary representation on the local, state, and national levels.

Consider the cataclysmic social and educational changes that are buffeting our profession today. Might our State Society dues actually be a bargain?

FAMILY LIFE EDUCATION

BY JAMES E. HARRYMAN, M.D.
CHAIRMAN, SPECIAL MSMS SUBCOMMITTEE ON FAMILY LIFE EDUCATION

Your presence is requested!

All physicians of the state responded nobly to the successful drive for school lectures on venereal disease.

Now we need your services again for April and May. The Michigan State Medical Society has designated those months for emphasis on the necessity for family life education in the Michigan educational system. The MSMS Maternal Health Committee has been hard at work to exploit all channels of communication, but without the efforts of you, the individual physician, we cannot succeed.

The Committee has obtained consultants from the Michigan Department of Public Health, the Michigan Council of Churches, the Governor's Human Resources Council, the Michigan Youth Commission, the Flint Board of Education, and other MSMS committees.

Although some form of sex education exists in all schools, there has been no uniformity from one educational system to another. In some it has been painfully inadequate. We have deliberately chosen the term "family life education" in preference to "sex education" since we think a totally integrated personality is our goal rather than just teaching "pelvic sex." In other words, 'til the present we've taught mechanics of the vehicle only. Now let's have the driver's training course!

Our aim is to make family life education a part of every child's education in each class from kindergarten through the 12th grade. Since many of our senior high school students are about to be married, they should be fully aware of the requirements for conjugal bliss.

Admittedly, this is an ambitious program, but well worth the effort when one reviews the abysmal ignorance of our patients who present themselves for counseling in family life and sexual matters. We hope to help children better understand the world around them and to stimulate self-understanding and personality responsibility so that they will develop the concept of themselves as persons of worth. We hope to develop each child's ability to adjust successfully to new and changing social situations, to use the family as a source of tolerance and understanding, and to develop appreciation of the roles played by the family members. We hope that by this goal we will have helped them approach marriage and establish homes equipped with realistic expectations. Perhaps we will be able to help in the development of healthy personalities and good citizens.

All this will take much work, but we feel that education is the keystone to our goal.

In April and May you will be asked to speak to various groups, educators, PTA's, service clubs, church groups, etc., concerning the need for family life education in our schools. Information for such talks will be provided by the MSMS Maternal Health Committee through local medical societies.

R.S.V.P.

WE MUST HELP THEM *

BY GEORGE H. LOWREY, M.D.
SCIENTIFIC EDITOR

Approximately 4,000 physicians are arriving annually from overseas to work and study in medical schools and hospitals in the United States. A large number stay on to practice medicine.

The foreign physician is here to stay, and in all probability more will come. They will assume the responsibility of patient care.

They come for a variety of reasons, but mainly because the facilities to learn medicine are better than in their own countries, they have less government control of their training or practice, and the income is good. The exodus is so great in Britain that the entire National Health Service is threatened.

TO THE AMERICAN physician these men and women are often considered "second rate" and unfortunately are thus dismissed with little more concern. This is a most unfortunate attitude and will lead to a lowering of medical services for many people in this country as well as abroad. Let us consider some of the facts.

Foreign physicians are preselected before entering this country. Through the examinations of the Educational Council for Foreign Medical Graduates only about one-fifth who apply are accepted.

The impression of inadequacy is often due to difficulty with communication problems and not intelligence. Our frequent use of the vernacular idiom does not improve this situation. We often have difficulty in making good sense to each other in our conversation.

Criticism of the foreign physician's approach to a medical problem often reveals our own narrow-mindedness. Our knowledge of medicine is far from complete, and we must not forget that new and different approaches to the solution of medical problems have often provoked ridicule at first though subsequently proved to be of great value.

OUR IDEAS AND METHODS of teaching medicine differ considerably from the classical European tradition to which many foreign students have been exposed. But let us not fail to recall some antiquated methods of teaching that are still exercised in our own medical schools.

An open mind is a healthy one.

In the further training of foreign students in this country, an equal opportunity must be offered, depending upon an unprejudiced evaluation of abilities. If we truly have as our aim good medical care for all people, no other approach is acceptable. All of us, as part or full-time medical educators, should make every effort to aid them in acquiring the best tools possible for medical practice.

ADVANTAGES OF MSMAS MEMBERSHIP

BY MRS. ALTA GREENE, PRESIDENT
MICHIGAN STATE MEDICAL ASSISTANTS SOCIETY, BATTLE CREEK

It is entirely possible that there are some physicians who are not familiar with the objectives of the Michigan State Medical Assistants Society (MSMAS) and the benefits available to its members.

The Society's objectives are to inspire its members to render honest, loyal, and more efficient

CONTINUED ON PAGE 476

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* The recent AMA Annual Report on Medical Education shows "that as of September 1, 1965, there were 47,082 students in graduate medical training in the United States. Of that total, 13,829 (29 percent) were graduates of foreign medical schools. The three countries contributing the most resident trainees were the Philippines (2,474), India (1,124), and Iran (536). The top contributors of intern trainees were the Philippines (563), Korea (271), and Thailand and Indonesia (137 each)."

The Association of American Medical Colleges Datagram, Volume 8, Number 6, reports that "in 1965 foreign medical graduates filled 24 percent of internship positions and 29 percent of residency positions in U.S. hospitals." In 1950, these two percentages were 9 and 10, respectively.

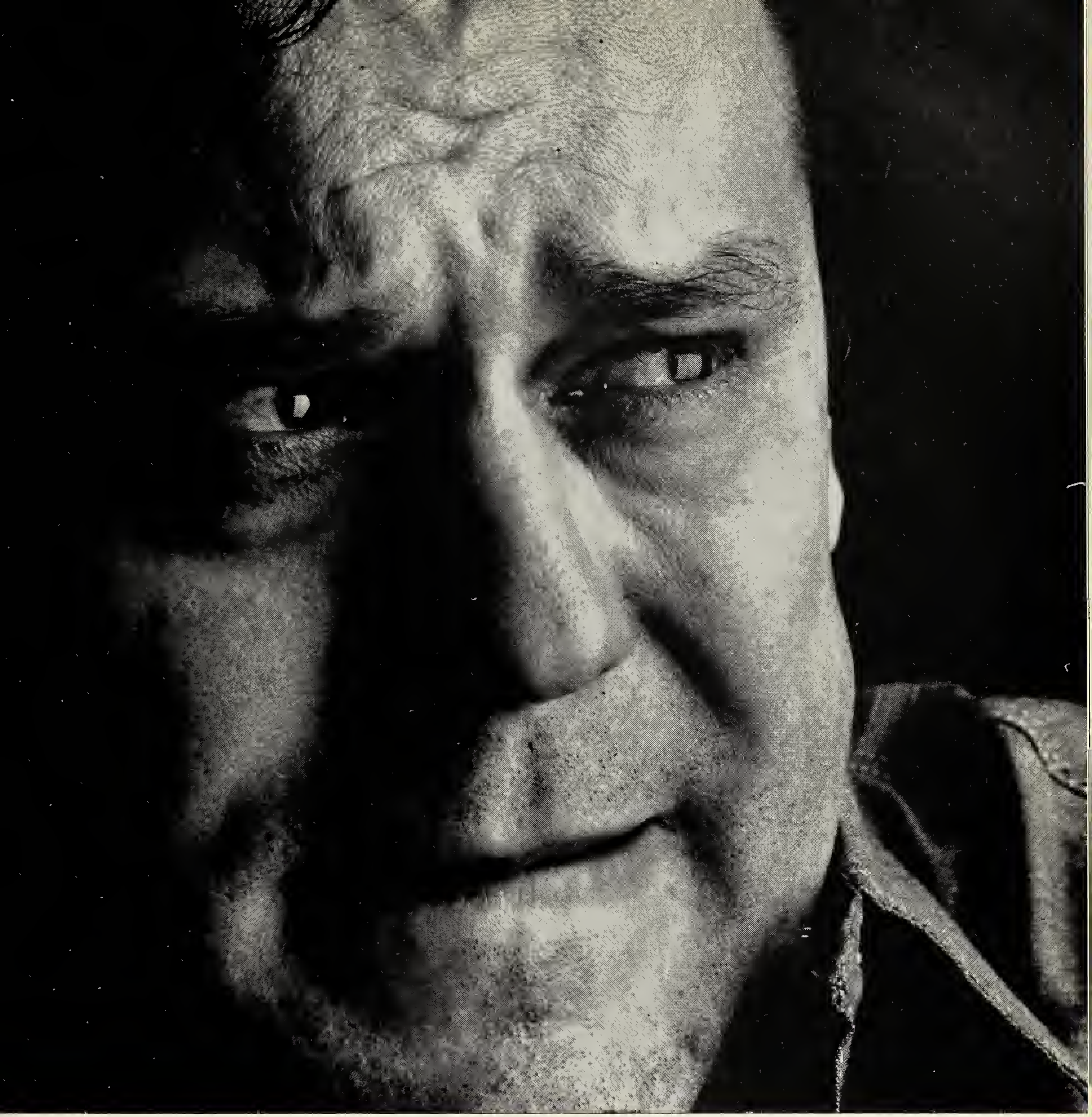

Photo professionally posed

Mike expects a penicillin injection. He's about to be pleasantly surprised.

His physician is going to prescribe an oral penicillin —Pen • Vee® K (potassium phenoxymethyl penicillin). It's usually so rapidly and completely absorbed that therapeutic serum levels are produced in 15 to 30 minutes. Higher serum levels generally last longer than with oral penicillin G.

Indications: Infections due to pathogens susceptible to oral penicillin G. Prophylaxis of rheumatic fever in patients with previous history of the disease.

Precautions: Skin rash, symptoms resembling those of serum sickness, or other manifestations of penicillin-allergy may occur. Measures for treating anaphylaxis should be readily available: epinephrine, oxygen and pressor drugs for relief of immediate allergic reactions; antihistamines and corticosteroids for delayed effects. Penicillin may delay or prevent the appearance of primary syphilitic lesions. Patients with gonorrhea who are suspected of concurrent syphilitic infections should be tested serologically for at least 3 months. Where lesions of primary syphilis are suspected, dark-field examination should precede use of penicillin. As with other antibiotics overgrowth of nonsusceptible organisms may occur; if so, discontinue and take appropriate measures. Treat β-hemolytic streptococcal infections with full therapeutic dosage for at least 10 days to prevent development of rheumatic fever or glomerulonephritis.

Contraindications: Infections caused by nonsusceptible organisms; history of penicillin sensitivity.

Composition: Tablets—125 mg. (200,000 units) and 250 mg., (400,000 units); Liquid—125 mg. (200,000 units) and 250 mg. (400,000 units) per 5 cc.

Wyeth Laboratories Philadelphia, Pa.

ORAL **PEN • VEE® K**

(potassium phenoxymethyl penicillin) Wyeth®

How long will
it take her
to recover from
her hip fracture
if she just
doesn’t care?

Does she really care?
Is she alert, encouraged, positive and optimistic about getting completely well soon?
Or has she given in to the demoralizing impact of confinement, disability and dependency?
When functional fatigue complicates convalescence, Alertonic can help...

Pleasant-tasting Alertonic is pipradrol hydrochloride—an effective cerebral stimulant whose gentle analeptic action helps counteract the apathy and inertia that can often delay convalescence—together with an excellent vitamin and mineral formula, in a satisfying 15% alcohol vehicle.

Nothing fosters confidence and a sense of well-being better than your own personal warmth, understanding and encouragement together with Alertonic to help insure prompt response.

Adequate dosage is important: Prescribe Alertonic—one tablespoonful t.i.d., 30 minutes before meals...tastes best chilled.

And for your patient's sake, prescribe Alertonic in the convenient, economical one-pint bottle.

Alertonic®

Available Only On Prescription

Each 45 cc. (3 tablespoonfuls) contains: alcohol, 15%; pipradrol hydrochloride, 2 mg.; thiamine hydrochloride (vitamin B_1) (10 MDR*), 10 mg.; riboflavin (vitamin B_2) (4 MDR), 5 mg.; pyridoxine hydrochloride (vitamin B_6), 1 mg.; niacinamide (5 MDR), 50 mg.; choline,† 100 mg.; inositol,† 100 mg.; calcium glycerophosphate, 100 mg. (supplies 2% MDR for calcium and for phosphorus) and 1 mg. each of the following: cobalt (as chloride), manganese (as sulfate), magnesium (as acetate), zinc (as acetate), and molybdenum (as ammonium molybdate).

*Multiple of adult Minimum Daily Requirement supplied.
†The need for these substances in human nutrition has not been established.

Indications: 1. Functional fatigue such as that often associated with: a depressing life experience or stressful time of life; advancing years; convalescence; limited activity or confinement. 2. Poor appetite and vitamin-mineral deficiency as they occur in: patients having faulty eating habits; geriatric patients who are losing interest in food; patients convalescing from debilitating illness or surgery.

Dosage: Adults, 1 tablespoonful; children (over 15 years old), 1 to 2 teaspoonfuls; children (4 to 15 years old), 1 teaspoonful. To be taken three times daily 30 minutes before meals.

Contraindications: As with other drugs with CNS stimulating action, Alertonic is contraindicated in hyperactive, agitated or severely anxious patients and in chorea or obsessive compulsive states.

Side effects: Reports of overstimulation have been rare. Patients who are known to be unduly sensitive to the effects of stimulant drugs should be observed carefully in the initial stages of treatment.

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service to the profession and the public which they serve; to strive at all times to cooperate with the medical profession in improving public relations; and to render educational service for the self-improvement of its members. The Society is non-union and non-profit.

MEMBERSHIP IS OPEN to those who are employed in an administrative or clinical capacity by or under the direct supervision of a doctor of medicine who is a member of the Michigan State Medical Society. One who is a member of a county medical assistants society automatically becomes a member of the MSMAS as well as the American Association of Medical Assistants Society, the only medical assistants organization approved and endorsed by the American Medical Association.

MSMAS holds several educational meetings during the year such as the Educational Seminar in April; the Upper Peninsula Seminar in July; the November Officer's and Committee Chairmen Workshop; and the Annual Convention in September, during which time the business of the Society is acted upon by the House of Delegates, and interesting and educational programs are offered for the benefit of the medical assistant.

To bring a closer alliance between the AAMA and its county and state chapters, the AAMA has recently provided each state with a Trained Area Counselor who is available to help with the state's overall educational program. MSMAS hopes eventually to set up a leadership training program on a state level to present educational material to component societies in Michigan. Many community colleges are now offering the opportunity for continued education and national certification of medical assistants in both administrative and clinical classifications.

An insurance program is available which offers health, life, accident, and retirement programs through MSMAS and/or AAMA.

THIS YEAR WE feel very fortunate to have as Chairman of the Advisory Board of the MSMAS, Glenn Millard, M.D., Detroit, who is also Chairman of the AAMA Advisory Board. We are, in addition, well represented on a national level by having Mrs. Betty Lou Willey, Port Huron, Past President of MSMAS, as Speaker of the AAMA House.

Being a member of the Medical Assistants Society and taking advantage of the opportunities it offers adds to an employee's worth, so why not encourage your office personnel to inquire about the benefits derived from being a member of this organization?

SAMA-100-WSU-1968

BY ROBERT S. LEVINE
WSU SAMA

The title of this article may seem strange, but it has great meaning. The superficial meaning of each of these four symbols is quite obvious. *SAMA* stands for the Student American Medical Association, *100* is a number, *WSU* is for Wayne State University, and *1968* is next year.

SAMA was founded in Chicago in December 1950. It is the largest medical student organization in the world, currently having over 50,000 active and affiliate members in the United States. The constitution defines the basic reason for SAMA:

> The objects of this Association shall be to advance the profession of medicine, to contribute to the welfare and the education of medical students, interns, and residents, to familiarize its members with the purposes and ideals of organized medicine, and prepare its members to meet the social, moral, ethical obligations of the profession of medicine.

In its 16 years of existence SAMA has lived up to its founding ideals. It contributes to the education of its members through its magazine, *The New Physician*, through sponsoring various programs such as research forums, the scientific exhibits contest, and many local programs.

It does much for the welfare of students. It provides low cost insurance. It studies issues important to its members, reports the ramifications of the issues to them, and makes known to others the feelings and needs of its members. It attempts to propose legislation deemed necessary to help its constituents.

SAMA strives to advance medicine by serving as another point of introspection. Its members look at their educations and discuss with others how education could be improved. Its members meet and try to decide their role in medicine and how they might best help themselves become doctors of the future—prepared to meet the challenge of a rapidly moving, dynamic profession.

The second part of the title, *100* deals with the third part, *WSU*, and the fourth part, *1968*. Translated, it means that Wayne State University will be celebrating its 100th anniversary in 1968. Not much needs to be said about Wayne State for most physicians are familiar with this great university. It began as a medical school in 1868.

In a short 100 years it has become one of the major universities in the world. It now has over 25,000 students, and its medical school has over 400. The Medical School itself is in a great state of flux. The development of the medical center in

CONTINUED ON PAGE 478

Check what you hear with a heart sound tracing

. . . easily and quickly recorded on your office cardiograph

Auscultation and phonocardiography should complement each other in your clinical diagnoses — the former by helping you assess the musical and non-musical character of sounds and murmurs, frequency composition and variations . . . the latter by pinpointing the precise beginning and ending of sounds and murmurs within the cardiac cycle. Chart tracings of sounds, for example, may help identify points of occurrence and duration characteristic of certain innocent and pathologic murmurs . . . delineate the delay and first sound accentuation in mitral stenosis . . . or isolate the typically high-pitched murmur between the first and second sounds in aortic stenosis, which might otherwise appear pansystolic because of the low or inaudible intensity of the second sound. To further aid the precise determination of timing of sounds and murmurs, *combined ECG-PCG recording* will clearly reveal the location of the sound within the cardiac cycle. The Hewlett-Packard 1506A Heart Sound Amplifier enables you to do just that — in conjunction with a 500 Viso cardiograph or other 2-speed instrument with adequate frequency response. By electronically measuring and sampling the heart sound signal at a frequency within the Viso's recording capability, the 1506A permits diagnostic-quality PCG's to be recorded by the 500 Viso.

The compact, self-powered Amplifier clips to the front of your 500 Viso, allowing diagnostic PCG's, ECG's, or the PCG superimposed on the ECG, to be recorded. Switch-selected filter positions of 50, 100, 250 and 500 Hz (cps) permit excellent recording clarity and separation of the frequency range of interest. In addition, the Amplifier is supplied with an Audiophone to give you a highly efficient electronic stethoscope, with separate controls for listening and recording. (As a teaching tool, the Amplifier and ECG let the user *see* the sounds recorded, *hear* them, and correlate the two with the ECG.)

Contact your local HP medical instrumentation specialist for complete technical details of the 1506A Heart Sound Amplifier — $450 with microphone, audiophone and cable, FOB Waltham, Mass., Cont. U.S. Hewlett-Packard Company, Sanborn Division, Waltham, Mass. 02154. In Europe: HPSA, 54 Route des Acacias, Geneva. 17754

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the heart of Detroit is moving more rapidly every day. Within the next ten years there should be over 800 students in Wayne's Medical School, and the Medical School will be the nucleus of a great medical center in the heart of the Midwest.

In honor of Wayne's Centennial SAMA will hold its annual meeting in Detroit in late April 1968. This meeting will be quite similar to the annual Michigan State Medical Society meeting. The SAMA House of Delegates will consider the work of SAMA during the previous year and plan the movement of SAMA for the future. Concurrently there will be a scientific meeting at which topics of interest not only to students, interns, and residents, but to all physicians, will be discussed.

Speakers from all over the country have been invited to these meetings, and the 1968 meeting will bring some to Detroit for the first time. The 1968 meeting of SAMA will be one of its best and will be a chance for Michigan to show itself off to the next generation of physicians.

WILL YOU HELP?

Why is it necessary for every physician to be an active member of his county medical society?

Muskegon County Medical Society President Warren G. White, M.D., answers the question in his "President's Message," volume 24, Number 52, of the *Muskegon Bulletin*. Doctor White writes:

"Because we *must* be a vital, driving force in our community, not only facing the physician-to-physician problems, but continually trying to repair our rather battered public image. We cannot crawl into our shells and rely on 'good medicine' to save the day for us. In this day and age, this latter concept, as fundamental as you and I know it is, cannot by itself preserve the private practice of medicine.

"So, to you reluctant colleagues who have your reservations about county society activities, let me issue a challenge! Please pitch in and help when asked, will you?"

Another editorial in a county society bulletin, *Kalamazoo Medicine,* recently called for more participation by the members. In this case, it was Robert B. Burrell, M.D., Delegate of the Kalamazoo Academy of Medicine, who challenged the members to greater participation. His actual editorial was aimed directly at the Kalamazoo Academy — but the message could be paraphrased only slightly to read as follows:

"It appears that physicians do have their share of fears, faults, fancies, and furies. The solving of our mutual problems and the placing of our responsibilities is a total need best met at the county society meeting and not in the coffee rooms.

"We are needed by the entire community — its government, hospitals, agencies and citizens. The problems are not for a few, but for all of us.

"Couldn't we decide *how* we might best fulfill our part of this picture?

"Couldn't we determine also what our individual needs — not wants — really are?

"Wouldn't it be interesting to establish a GOAL TOGETHERNESS, so that each individual physician could carry a concept of our total mood into his individual, hospital and civic interests? Might it not be rewarding to have some interests?

"I have a feeling that our county society is our Forum of Education in how we are to meet, and be met in our community.

"Let us SPEAK OUT in our county meetings. Let us admit our fears of, and hopes for our future in the increasing Third Party type of medical practice.

"I wonder if 'THEY' who are doing it aren't really 'US' who are receiving?"

CHALLENGES WOMEN'S EDITORS TO CARRY LESS FROTH

Medical organizations have many opportunities in Michigan to increase their efforts to "hit" the women's pages in Michigan newspapers.

The door was pushed open by Edmund C. Arnold, Syracuse University, in his recent address to the Michigan Women's Press Club.

Mr. Arnold was critical of the women's editor because "there is too much froth on the women's pages."

Mr. Arnold recommended that every day on each page there be included:

—something to make readers gasp,

—something to make them nod in agreement,

—something to make them laugh, cry, mad, glad, perspire,

—and something to inspire them.

Although he did not single out the need for more health news, Mr. Arnold argued that the women's page faces a challenge to educate its readers.

IT'S AS PLAIN AS THE NOSE ON HIS FACE.

UP TO 10–12 HOURS' CLEAR BREATHING ON ONE TABLET

Dimetapp® Extentabs®

(Dimetane® [brompheniramine maleate], 12 mg.; phenylephrine HCl, 15 mg.; phenylpropanolamine HCl, 15 mg.)

In sinusitis, colds, or U.R.I., Dimetapp lets congested patients breathe easy again. Each Extentab brings welcome relief all day or all night, usually without drowsiness or overstimulation. Its key to success? The Dimetapp formula — Dimetane (brompheniramine maleate), a potent antihistamine reported in one study to have elicited side effects as few as the placebo,* teamed with decongestants phenylephrine and phenylpropanolamine — in a dependable 10- to 12-hour form.

Contraindications: Patients hypersensitive to antihistamines. Not recommended for use during pregnancy.

Precautions: Until the patient's response has been determined, he should be cautioned against engaging in operations requiring alertness. Administer with care to patients with cardiac or peripheral vascular diseases or hypertension.

Side Effects: Hypersensitivity reactions including skin rashes, urticaria, hypotension and thrombocytopenia have been reported on rare occasions. Drowsiness, lassitude, nausea, giddiness, dryness of the mouth, mydriasis, increased irritability or excitement may be encountered.

Dosage: 1 Extentab morning and evening, or as needed.

Supplied: Bottles of 100 and 500.

Also available: Dimetapp® Elixir for conventional *t.i.d.* or *q.i.d.* dosage. See package insert for further details.

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RICHMOND, VIRGINIA 23220
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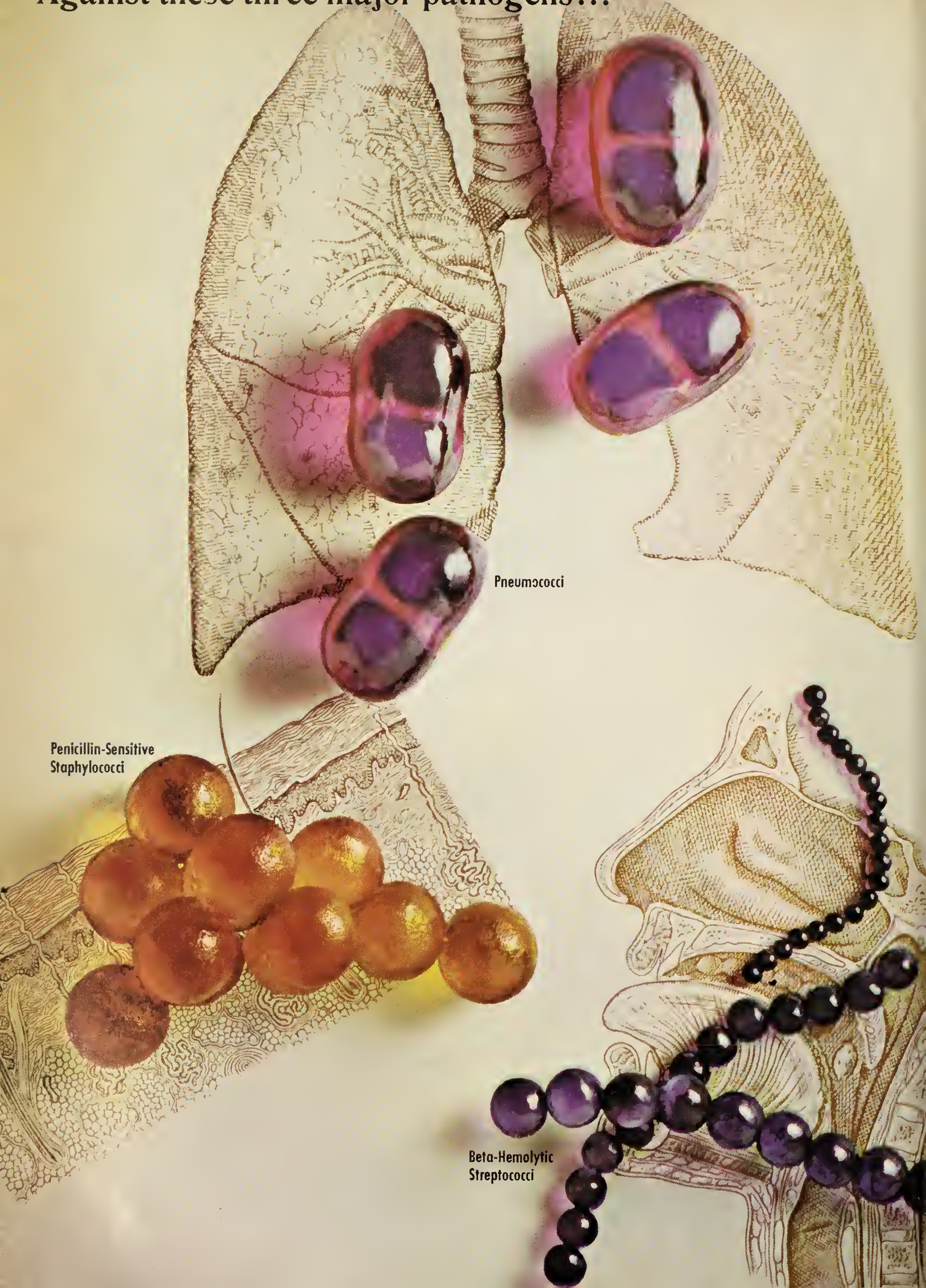
*Schiller, I. W., and Lowell, F. C.: New England J. Med. 261:478, 1959.

Against these three major pathogens…


Pneumococci
Penicillin-Sensitive Staphylococci
Beta-Hemolytic Streptococci

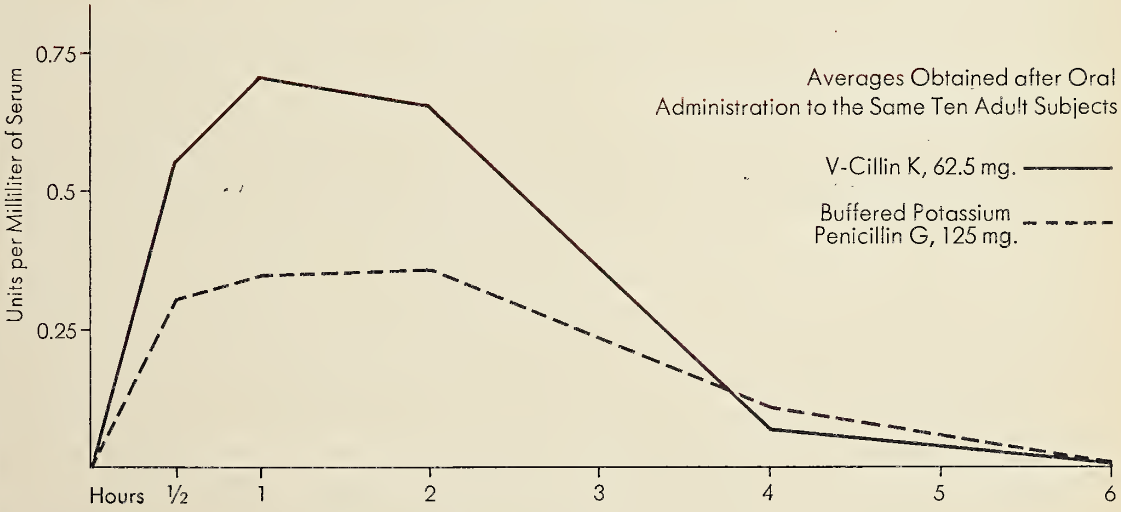
V-Cillin K® provides unexcelled oral antibacterial activity

because it combines a high degree of in-vitro activity...

Antibiotic	Staph. Aureus (Penicillin-Sensitive) MIC (mcg./ml.) Median	Range	Streptococcus, Group A MIC (mcg./ml.) Median	Range	Diplococcus Pneumoniae MIC (mcg./ml.) Median	Range
Penicillin V	0.02	0.02-0.04	0.02	0.003-0.4	0.01	0.005-0.2
Penicillin G	0.02	0.005-1.6	0.005	0.002-0.2	0.02	0.01-0.1
Methicillin	1.6	0.4-6.3	0.2	0.1-0.4	0.2	0.1-1.6
Oxacillin	0.4	0.1-3.1	0.04	0.02-0.4	0.1	0.04-0.8
Cloxacillin	0.2	0.2-0.8	0.1	0.1-0.8	—	—
Nafcillin	0.4	0.2-0.8	0.04	0.02-0.1	0.02	0.02-0.2
Ampicillin	0.2	0.1-0.8	0.02	0.01-0.04	0.02	0.01-0.04

Adapted from Klein, J. O., and Finland, M.: New England J. Med., 269:1019, 1963.

with high blood levels, even in the presence of food



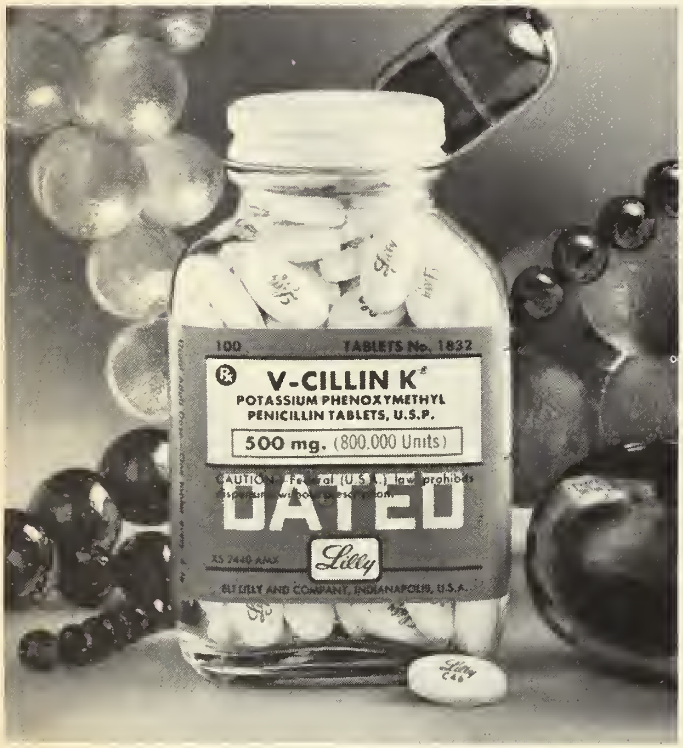
Adapted from Griffith, R. S., and Black, H. R.: Current Ther. Res., 6:253, 1964.

V-Cillin K® Lilly 700157

Potassium Phenoxymethyl Penicillin

(See next page for prescribing information

New 500 mg. tablets...a more convenient way to give high doses


100
TABLETS No. 1832
℞ V-CILLIN K®
POTASSIUM PHENOXYMETHYL PENICILLIN TABLETS, U.S.P.
500 mg. (800,000 Units)
CAUTION—Federal (U.S.A.) law prohibits dispensing without prescription.
DATED
Lilly
ELI LILLY AND COMPANY, INDIANAPOLIS, U.S.A.

Description: V-Cillin K is the potassium salt of V-Cillin® (phenoxymethyl penicillin, Lilly). This chemically improved form combines acid stability with immediate solubility and rapid absorption. Higher serum levels are obtained more rapidly with this penicillin than with equal oral doses of penicillin G. The higher serum levels and acid stability of V-Cillin K make it a more dependable penicillin for oral use.

V-Cillin K, Pediatric, is an oral solution of clinically proved V-Cillin K in teaspoon dosage form. When mixed as directed, each 5 cc. (approximately one teaspoonful) will contain 125 mg. (200,000 units) phenoxymethyl penicillin as the potassium salt.

Indications: V-Cillin K has been shown to be effective in the treatment of streptococcus, pneumococcus, and gonococcus infections as well as infections caused by sensitive strains of staphylococci. It may be used for the prophylaxis of streptococcus infections in patients with a history of rheumatic fever and for the prevention of bacterial endocarditis after tonsillectomy and tooth extraction in those patients with a history of rheumatic fever or congenital heart disease.

Contraindication: V-Cillin K should not be administered to a patient with a history of penicillin hypersensitivity.

Precautions: V-Cillin K should be used cautiously, if at all, in a patient with a strongly positive history of allergy. Reactions occur more frequently in individuals with bronchial asthma or other allergies or in those who have previously demonstrated sensitivity to penicillin. I hypersensitivity reactions occur, the drug should be discontinued.

Adverse Reactions: Although serious allergic reactions are much less common with administration of oral penicillin than with intramuscular forms, skin rash, symptoms resembling those of serum sickness, or other manifestations of penicillin allergy may occur. When penicillin is administered, measures for treating anaphylaxis should be readily available. Those include epinephrine, oxygen, and pressor drugs for relief of immediate allergic manifestations as well as antihistamines and corticosteroids for delayed effects.

The use of antimicrobial agents may be associated with the overgrowth of antibiotic-resistant organisms; in such a case, antibiotic administration should be stopped and appropriate measures taken.

Administration and Dosage: For Tablets V-Cillin K and for V-Cillin K, Pediatric, the usual dosage ranges from 125 mg. (200,000 units) three times a day to 500 mg. (800,000 units) every four hours. For infants, the daily dosage may be 50 mg. per Kg. of body weight divided into three doses.

Beta-hemolytic streptococcus infections without associated bacteremia may be treated with 200,000 to 400,000 units three times a day. Therapy should be continued for a minimum of ten days to prevent development of rheumatic fever and/or other serious complications. Dosage for routine streptococcus prophylaxis in patients with a history of rheumatic fever or congenital heart disease may be 200,000 units once or twice daily. When such patients undergo tonsillectomy, tooth extraction, or other minor surgery, the prophylactic dose should be 500,000 units every six hours given two days prior to surgery and for two days postoperatively. If oral medication is not feasible on the day of surgery, parenteral therapy should be considered. Mild to moderately severe pneumococcus pneumonia has been treated effectively with 250 mg. every six hours.

In staphylococcus infections, 400,000 units or more should be given every six to eight hours in conjunction with indicated surgical procedures.

For gonorrhea in males, 500 mg. (800,000 units) every six hours fo three doses may be employed; in females, 500 mg. every four hours fo six doses are recommended. Patients with a suspected lesion of syphilis should have a dark-field examination before receiving penicillin and monthly serologic tests for a minimum of three months.

How Supplied: Tablets V-Cillin K, U.S.P., 125 mg. (200,000 units), in bottles of 50 and 100; 250 mg. (400,000 units), and 500 mg. (800,00 units) in bottles of 24 and 100.

V-Cillin K, Pediatric, for Oral Solution, 125 mg. (200,000 units) pe 5 cc. of solution, in 40, 80, and 150-cc.-size packages.

Additional information available to physicians upon request. Eli Lilly and Company, Indianapolis, Indiana 46206.

Lilly

70015

MICHIGAN MEDICINE

DEADLINE FOR THIS BREAKING NEWS WAS MARCH 27, 1967

Recapping MSMS Proposals Before the 1967 Legislature

Senator Harold Volkema, Holland Republican, has introduced *SB 637* for MSMS which will permit the Michigan Board of Registration in Medicine to accept the examinations given by the National Board of Medical Examiners, provided this examination is deemed equivalent to the Michigan test. The bill is under consideration in the Senate State Affairs Committee, Senator Thomas Schweigert, Chairman.

HB 2520, which declares the transfusion of blood to be a service, not a sale (thus not subject to implied warranty), has been introduced for MSMS by Representative Robert Traxler, Bay City Democrat. This bill is before the Legislature for the second successive year. It is being considered by the House Taxation Committee, Representative James Folks, Chairman.

A bill to prevent the sale of fire extinguishers containing certain potentially deadly ingredients for use in private homes and private automobiles has been introduced by Representative Charles Davis, Lansing area Republican. *HB 2482* is before the House Public Safety Committee, Representative Quincy Hoffman, Chairman.

Basic Science Law repeal is presently before both houses of the Legislature. Senator Gilbert Bursley, Ann Arbor Republican, and Representative James Farnsworth, Plainwell Republican, have introduced *SB 249* and *HB 2203* as identical bills in each chamber. Last year the House unanimously (100-0) passed this repeal bill, but it failed to clear the Senate. Passage of the measure will assist greatly in the recruiting of much-needed medical manpower for practice in Michigan. *SB 229* is under consideration in Senate State Affairs, Senator Schweigert, Chairman, and *HB 2203* is before the House Public Health Committee, Representative Blair Woodman, Chairman.

Senator George Fitzgerald, Grosse Pointe Park Democrat, has introduced *SB 275,* MSMS' bill to provide for a policy-making Mental Health Commission of five members to be appointed by the Governor (one member would be nominated by MSMS). This bill, which would provide for continuity in mental health policy and bring several expert minds to bear on the formulation of that policy, is also being considered in the Senate State Affairs Committee, Senator Schweigert, Chairman.

Senator Fitzgerald has also introduced a bill, *SB 366,* to create a policy-making Board of Health of seven members (two of which would be M.D.'s selected from a list submitted to the Governor by MSMS). One member would be an osteopath. This bill, introduced for the same basic reasons outlined regarding a Mental Health Commission, is also before the Senate State Affairs Committee.

Representative Peter Kok, Grand Rapids Republican, has introduced *HB 2586* at MSMS' request, to provide specific qualifications for the State Mental Health Director. The bill is before the House Mental Health Committee, Mr. Kok, chairman.

HB 2269 has been introduced for MSMS by Representative William Jowett, Port Huron Republican, and has been assigned to the House Public Health Committee, Representative Blair Woodman, Chairman. It would specifically provide qualifications for the State Director of Public Health.

Senator Mrs. Lorraine Beebe, Republican of Dearborn and Chairman of the Senate Health, Social Services, and Retirement Committee, has introduced *SB 274* for MSMS. This bill, an amendment to the PKU Law, would place responsibility for testing with the physician in charge of the care of newborn (present law states "physician in charge at birth"). This bill was requested by the 1966 MSMS House of Delegates, and is being considered by Senator Beebe's Committee.

SB 339 has been introduced for MSMS by the Honorable Robert Richardson, Saginaw Republican and Chairman of the Senate Judiciary Committee. It provides protection for physicians who serve on hospital tissue committees from liability with their duties in reviewing cases. Reports rendered would be kept confidential, protecting both the patient and the physician. The bill was co-sponsored by the entire Senate Judiciary Committee, which received it for initial action.

MSMS Honors Mrs. Romney

It was a happy occasion when Mrs. George Romney received a MSMS citation from Robert J. Mason, M.D., right, Council Chairman, and from W. W. Jack, M.D., Grand Rapids, MSMS Maternal Health Committee Chairman, at the Sixth Annual Conference on Maternal and Perinatal Welfare at Flint March 15. Council Chairman Robert J. Mason, M.D., Birmingham, read the award "To Mrs. George Romney, by example, leadership and personal conviction, you communicate the importance of the family in developing healthy personalities and sound values and in fostering constructive human relationships." The Conference and the citation helped to launch the MSMS April-May Family Life Education project. (More details in the May issue.)

Support Proposal To License Labs

State Representatives Blair Woodman, Owosso Republican, and Stanley Davis, Grand Rapids Democrat, have introduced HB 2773 to provide for the licensing of medical laboratories. Their bill, which is endorsed by both the Michigan Pathology Society and the Michigan Society of Internal Medicine, has also received the support of the Michigan State Medical Society.

The Woodman-Davis Bill, unlike a similar proposal (HB 2378), makes provision for a Laboratory Facilities Council which must concur with the Director of Public Health in the making of rules and regulations. This Council, besides containing physicians, is representative of others knowledgeable in laboratory management and skills. HB 2378, however, vests laboratory licensing directly with the Department of Public Health.

"Implied Consent" Bills Controversial

House Bill 2038, dealing with "implied consent," has reached the floor of the House of Representatives for a vote. A similar measure, SB 57, remains under consideration in the Senate Judiciary Committee.

The present Michigan law provides that any person has a right to refuse to submit to a test of his blood, breath, urine, or other bodily substance. The law also provides "Only a duly licensed physician, or a licensed nurse or medical technician under the direction of a licensed physician, acting at the request of a police officer, can withdraw blood for the purpose of determining the alcoholic content therein under the provisions of this act."

MSMS, by 1966 action of its House of Delegates, has endorsed the "implied consent" concept. The Legal Affairs Committee, reiterating the House position, has stated that physicians should strongly support mandatory testing legislation on both medical and moral grounds.

It must be recognized, however, that there are also legal implications in the present law and its proposed amendments. For example, although the law now mentions licensed nurses and medical technicians as persons who can draw blood, it provides that this must be done *under* the direction of a physician. The Michigan Attorney General has ruled that this means that the physician must be physically present (if the law said "at" the direction of a physician, this would not be true). If the physician has to be there, he might as well draw the blood himself—and go to court to testify about his actions.

Physicians want to know whether, under the present law, they can be sued for assault if they do draw blood from a person who has not given, or is incapable of giving, his consent. MSMS Legal Counsel says they probably can be sued.

The proposed new law would add this proviso: "No liability for a crime or civil damages predicated on the act of withdrawing blood and related procedures attaches to a qualified person who withdraws blood or assists in the withdrawal in accordance with this act, at the request of a police officer, unless the withdrawal is performed in such a manner as to constitute wilful or wanton misconduct."

MUSKEGON TRAUMA MEETING

Five outstanding speakers are scheduled to participate in the Seventh Annual Symposium on Trauma, at the Holiday Inn, Muskegon Heights, on April 26.

The main speaker for the event will be Carl A. Moyer, M.D. Doctor Moyer is director of research at Michigan Technological University, Houghton, and his subject will be "Treatment of Burns with Silver Nitrate Method."

MPORTANT TO READ, REREAD AND SAVE

Q and A about Medicaid (Title 19)

Much confusion, misunderstanding, and un- ounded rumors regarding Medicaid — the State ledical Assistance Program — have occurred. Medi- id is a medical assistance program designed to ssist Michigan's needy persons in paying expen- s for a wide variety of medical services necessary protect health. Such services are recognized un- er state law and furnished by licensed practition- s. Below is the current program:

uestion: Who is eligible for this program?

nswer: There are two eligible groups:

GROUP I—CATEGORICALLY NEEDY:

Those receiving money grants under one of the following programs: old age assistance, aid to the blind, aid to the disabled or aid to dependent children.

GROUP II—MEDICALLY NEEDY:

a) Children under 21 years of age and whose family meets the conditions of financial eligibility for medical assistance.

b) Adults who would be eligible for one of the categorical assistance programs but do not meet the financial qualifications. These persons must then meet the conditions of financial eligibility for Group II—Medically Needy.

uestion: Explain financial eligibility for Title XIX Medical Assistance.

nswer: Group I—Categorically Needy are automatically eligible for medical assistance. Persons in Group II—Medically Needy are eligible if their incomes and property values fall under specified income levels.

uestion: What happens if income or property exceeds the "protected" income levels?

nswer: Medical assistance may be granted but not until medical expenses in the amount of the "excess" have been incurred by the patient.

uestion: What services are covered?

nswer: Medical assistance is available to the following:

GROUP I—CATEGORICALLY NEEDY:

1. Inpatient and outpatient hospital services.
2. Nursing home services and care in approved county medical facilities.
3. Physician's services, both in-hospital and home and office.
4. Home nursing services.
5. Prescribed drugs.
6. Ambulance service when medically authorized.

GROUP II (MEDICALLY NEEDY)

Eligible for *all* above services except:

a) Prescribed drugs are limited to in-hospital patients.

b) Physician's services are limited to in-hospital services.

Question: Does this mean that the physician may be reimbursed for treating a medically needy patient in a hospital, but cannot receive reimbursement for treatment in his office or the patient's home?

Answer: Yes.

Question: How will the physician be paid?

Answer: The physician will be paid his usual, customary, and prevailing fee as follows:

1. Physicians will be paid directly by Blue Shield by *assignment only.* No direct billing is permitted under the Medicaid program.
2. The customary charges for similar services generally made by the physician furnishing such services; and
3. The prevailing charges for similar services in the locality.
4. During the initial stages of this program, the Intermediary will use the Michigan Relative Value Study as a major *guideline* until profiles of individual physician charges can be compiled.

Question: How will the physician know of a patient's eligibility?

Answer: Each recipient will display an identification card containing the following:

A. Expiration date.

B. Group of service.

The "Group of Service" will be shown in the box marked *"Program and County Code"* on the identity card. This card, if not expired, establishes eligibility for either Group I or Group II service as outlined above.

Question: Who is the local contact regarding the Medicaid—Title XIX Program?

Answer: The local County Office of Social Services.

Dated: March 13, 1967.

These Questions and Answers will help reduce the confusion and misunderstanding about Medicaid (Title XIX). The Committee recommends that you cut these pages from *Michigan Medicine* and save them. Further information about Medicaid may be obtained by writing to MSMS, 120 West Saginaw, East Lansing, 48823.

Legal Affairs Committee Screens 75 Health Bills

Meeting on March 15 at MSMS Headquarters, the Legal Affairs Committee examined 75 separate legislative proposals bearing some relationship to health. Of these, 11 Senate bills (including those introduced for MSMS) and 16 House bills (also including MSMS' own) were selected for careful and continuing observation.

However, inasmuch as legislators were permitted to introduce new bills until March 16, those introduced on that date are still not available for study. An estimated 400 bills must still be examined.

Included among the proposals under continuing MSMS surveillance are bills dealing with reimbursement under the Michigan Crippled and Afflicted Children programs (SB 3 and SB 10), hospital licensing (SB 16), "implied consent" legislation (SB 57), medical examiner proposals (SB 107), and House bills on hospital licensing (HB 2028), "implied consent" (HB 2038), a medical evaluation board for the Secretary of State (HB 2151), a pre-school vision testing proposal (HB 2152), governmental reorganization (HB 2197), an amendment to the university hospital act (HB 2248), a bill to grant more funds for county health departments (HB 2518), a nurse practice act (HB 2597), and a bill opposed by MSMS, HB 2635, which would compel physicians to report suspected mental retardation of a newborn infant to the Mental Health Department.

Other medical proposals referred to specialty groups for opinion and advice include a proposed change in last year's hearing-aid dealer licensure law (HB 2613), a proposal for a new public health laboratory in Wayne County (HB 2489), a workman's compensation amendment (HB 2349), and a bill to provide funds for rehabilitation of alcoholics (SB 336), along with a number of bills dealing with the practice of optometry.

Smoking Councils Invites Support Of Eight Bills

The Michigan Council on Smoking and Health is urging individual physician support of a group of bills recently introduced in the Michigan House of Representatives. This group of bills is called the Children's Health Education and Preventive Smoking Legislation.

The primary purpose and intent of this legislation is to strengthen our health education programs in the schools so that children will be fully informed of the potential health hazards of cigarette smoking, alcohol and drug addiction. Immediate safeguards restricting the uses and availability of cigarettes are needed to complement this long-range educational program.

The MCSH is urging passage of: HB 2563, HB 2564, HB 2622, HB 2565, HB 2566, HB 2567, HB 2568, HB 2600.

Meet the Introducers of the MSMS Bills . . .

Nineteen of Michigan's 38 Senators, and 13 State Representatives, have assisted MSMS in bringing its own bills before the 1967 session. Some of these lawmakers have placed their names on several Society measures. A list of the introducers, along with the bill numbers (cross-reference with the above article) follows:

Senator Harold Volkema: SB 637, SB 274
Senator Gilbert Bursley: SB 229
Senator Emil Lockwood: SB 229
Senator George Fitzgerald: SB 274, SB 275, SB 366
Senator John Bowman: SB 275
Senator Coleman Young: SB 275, SB 366
Senator Roger Craig: SB 275, SB 339, SB 366
Senator Charles Youngblood: SB 275
Senator John McCauley: SB 275, SB 366
Senator James Gray: SB 275
Senator Michael O'Brien: SB 366
Senator Jerome Hart: SB 336
Senator Mrs. Lorraine Beebe: SB 274
Senator James Fleming: SB 274, SB 339
Senator George Kuhn: SB 274
Senator Arthur Cartwright: SB 274
Senator Robert Richardson: SB 339
Senator Harvey Lodge: SB 339
Senator Basil Brown: SB 339

Representative Blair Woodman: HB 2520, HB 2586, HB 2669
Representative Peter Kok: HB 2203, HB 2586
Representative Donald Holbrook: HB 2520
Representative Raymond Baker: HB 2520
Representative Charles Davis: HB 2482
Representative James Farnsworth: HB 2203
Representative Stanley Davis: HB 2482
Representative Clifford Smart: HB 2586
Rep. Robert Davis: HB 2482
Representative William Jowett: HB 2669
Representative Edson Root, Jr.: HB 2669
Representative Gustave Groat, Sr.: HB 2669

Thank these Senators and Representatives. They are making a real effort to bring to the attention of the Legislature, and to secure passage of, sound health legislation!

THIS SIDE UP

"Livingston...vertigo is my doom!"
Cried Stanley in his doctor's room.

Said the doc, "For your ills
I've got just the pills."

Said Stan,
"Antivert, I presume."

Antivert® tablets/syrup stops vertigo

(meclizine HCl, niacin)

Tablets: (meclizine HCl 12.5 mg. and niacin 50 mg.) Syrup: (each 5 cc. teaspoonful contains meclizine HCl 6.25 mg. and niacin 25 mg.)

Most widely prescribed anti-vertigo agent[1]
Complete to moderate relief of symptoms in 9 out of 10 patients[2]

Antivert, the leading anti-vertigo product,[1] combines meclizine HCl, an outstanding drug for treatment of vestibular dysfunction, with niacin, a drug of choice for prompt vasodilation. Prescribe Antivert for your patients with vertigo, Meniere's syndrome and allied disorders.

Precautions and contraindications: Frequent, short-lived reactions include: cutaneous flushing, sensations of warmth, tingling and itching, burning of skin, increased gastrointestinal motility, and sebaceous gland activity. In explaining these reactions to the patient, it is suggested that they be regarded as a desirable physiological sign that the niacin is carrying out its intended function of vasodilation. Because of this vasodilation, severe hypotension and hemorrhage are obvious contraindications to Antivert therapy. Although the incidence of drowsiness and other atropine-like side effects such as dry mouth and blurring of vision is low, the physician should alert the patient to the need for due precautions when engaging in activities where alertness is mandatory. **Use in women of childbearing age:** A review of available animal data reveals that meclizine exerts a teratogenic response in the rat. In one study a dose of 50 mg./kg./day (50 times the maximum recommended human dose) produced cleft palate in 2 of 87 fetuses when administered to the rat at critical times during the first 15 days of gestation. At doses of 125 mg./kg./day, meclizine will produce 100% incidence of cleft palate in the rat. At doses of 25 mg./kg./day, decreased calcification of the vertebrae and relative shortening of the limbs were also produced in the rat, but experts disagree as to whether this is a teratogenic response. While available clinical data are inconclusive, scientific experts are of the opinion that this drug may possess a potential for adverse effects on the human fetus. Consequently, consideration should be given to initial use of a nonphenothiazine agent that is not suspected of having a teratogenic potential. In any case, the dosage and duration of treatment should be kept to a minimum. **Dosage:** One tablet or one to two teaspoonfuls (5-10 cc.) t.i.d. just before meals. Specific requirements for individual patients should be determined by the physician. **Supplied:** Tablets in bottles of 100 and 500. Syrup in pint bottles. RX only.

References: 1. Based on 1966 data from independent physicians' market survey organization. 2. Scal, J. C.: Eye Ear Nose & Throat Month. 38:738 (Sept.) 1959.

Neobon®

geriatric supplement

helps keep them 'on the go'

Each capsule contains:

(1) **Vitamins and Minerals**	
Vitamin A (acetate)	2000 U.S.P. units
Vitamin D (ergocalciferol, U.S.P.)	200 U.S.P. units
Vitamin B_1 (thiamine mononitrate, U.S.P.)	0.5 mg.
Vitamin B_2 (riboflavin, U.S.P.)	0.5 mg.
Vitamin B_6 (pyridoxine HCl, U.S.P.)	0.5 mg.
Niacinamide, U.S.P.	50 mg.
Calcium pantothenate, U.S.P.	5 mg.
Vitamin E (di-alpha tocopheryl acetate)	5 I.U.
Rutin	5 mg.
Cobalt (from cobalt sulfate)	0.033 mg.
Molybdenum (from sodium molybdate)	0.066 mg.
Copper (from copper sulfate)	0.33 mg.
Manganese (from manganese sulfate)	0.33 mg.
Magnesium (from magnesium sulfate)	2 mg.
Iodine (from potassium iodide)	0.05 mg.
Potassium (from potassium sulfate)	1.66 mg.
Zinc (from zinc sulfate)	0.4 mg.
(2) **Hematopoietic Factors**	
Iron (from ferrous sulfate)	3.40 mg.
Vitamin B_{12} (cobalamin concentrate, N.F., as Stablets®)	1 mcg.
Vitamin C (ascorbic acid, U.S.P.)	50 mg.
(3) **Digestive Enzyme**	
Pancreatic substance*	50 mg.
(4) **Gonadal Hormones**	
Methyltestosterone, N.F.	1.0 mg.
Ethinyl Estradiol, U.S.P.	0.006 mg.
(5) **Amino Acids**	
L-lysine (monohydrochloride)	50 mg.
L-Glutamic acid	30 mg.

*Enzymatically active defatted material obtained from 250 mg. of whole fresh pancreas.

For older adults who require it, daily supplementation with Neobon can help overcome decreases in endogenous gonadal hormone production, as well as deficiencies of iron, vitamins and other nutritional factors. In a single convenient capsule, Neobon provides vitamins, minerals, gonadal hormones, hematopoietic factors, digestive enzymes, and amino acids—all selected for adjunctive therapeutic value in the geriatric syndrome. For example, one of the gonadal hormones in Neobon is ethinyl estradiol. It is more slowly metabolized in the body than natural estrogens or their esters.

Precautions: Contraindicated in patients in whom estrogen or androgen therapy should not be used, as in carcinoma of the breast or prostate.

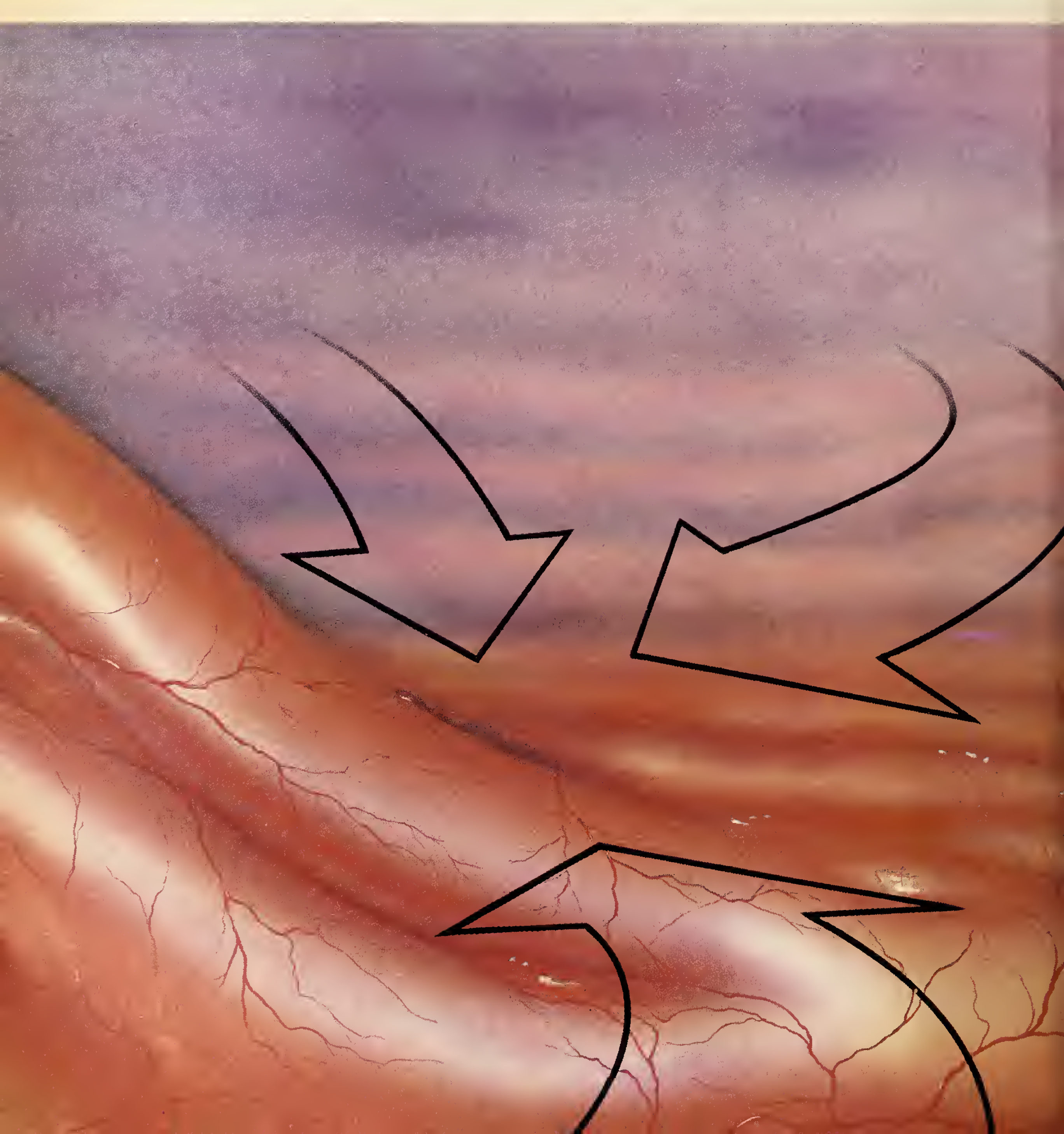
Dosage: One capsule, t.i.d. with meals, or as directed by physician.

Supplied: Bottles of 60 capsules. Rx only.

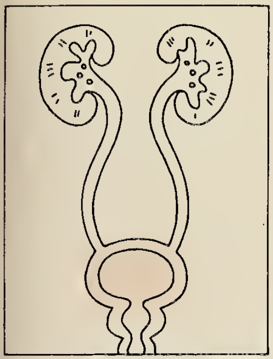
J.B. ROERIG DIVISION
CHAS. PFIZER & CO., INC.
NEW YORK, N.Y. 10017

The battle with bacteria: cystitis

Artist's conception of cystoscopic view of bladder showing congested blood vessels and edema around ureteral orifice.



consider Gantanol (sulfamethoxazole)



For vigorous treatment of G.U. infections before the invaders become entrenched... Gantanol (sulfamethoxazole) offers a comprehensive spectrum of antibacterial effectiveness against most common gram-negative as well as gram-positive invaders. In addition, it provides satisfactory concentrations in the blood and urine with ready diffusion into interstitial fluids for antibacterial activity at foci of bacterial invasion.

High antibacterial activity against *E. coli* and other common urinary pathogens... A review of 153 cases of acute G.U. infections reported in the literature shows that 90% responded to Gantanol (sulfamethoxazole), with over one-half of these patients showing excellent relief of symptoms.[1,2] Even in stubborn chronic G.U. infections, almost 60% of 450 patients improved on Gantanol (sulfamethoxazole), including many who had not responded to other antibacterials.[1-6]

Generally uncomplicated therapy enhances the favorable clinical results... Of the total 686 patients from the studies cited,[1-6] only three discontinued therapy because of side effects. Most of the side effects reported (approximately 3%) were mild and included nausea and/or vomiting, skin rash, dizziness, headache, gastritis, generalized uneasiness and itching.[1-6]

1. Peters, J. H.: *J. Urol.*, 87:747, 1962. 2. Draper, J. W., *et al.*: *South. M. J.*, 57:920, 1964. 3. Stewart, B. L.: *J. Urol.*, 87:491, 1962. 4. Hagstrom, R. S.: *Rocky Mountain M. J.*, 59:(2), 37, 1962. 5. Arnold, J. H.: *Clin. Med.*, 71:552, 1964. 6. Nelson, C. G.: *Colorado GP*, 3:(3), 2, 1961.

Before prescribing, please consult complete product information, a summary of which follows:

Contraindicated in sulfonamide-sensitive patients, pregnant females at term, premature infants, or newborn infants during first three months of life.

Warnings: Use only after critical appraisal in patients with liver damage, renal damage, urinary obstruction or blood dyscrasias. If toxic or hypersensitivity reactions or blood dyscrasias occur, discontinue therapy. In intermittent or prolonged therapy, blood counts and liver and kidney function tests should be performed.

Precautions: Observe usual sulfonamide therapy precautions, including maintenance of an adequate fluid intake. Use with caution in patients with histories of allergies and/or asthma. Patients with impaired renal function should be followed closely since renal impairment may cause excessive drug accumulation. Occasional failures may occur due to resistant microorganisms. Not effective in virus or rickettsial infections.

Adverse Reactions: Headache, nausea, vomiting, urticaria, diarrhea, hepatitis, pancreatitis, blood dyscrasias, neuropathy, drug fever, skin rash, Stevens-Johnson syndrome, injection of the conjunctiva and sclera, petechiae, purpura, hematuria or crystalluria may occur, in which case the dosage should be decreased or the drug withdrawn.

Dosage: Adults—4 tablets initially, then 2 tablets b.i.d. or t.i.d. depending upon severity of infection. Children—1 tablet/20 lbs initially, followed by ½ tablet/20 lbs b.i.d.

How Supplied: Tablets, 0.5 Gm, bottles of 50.

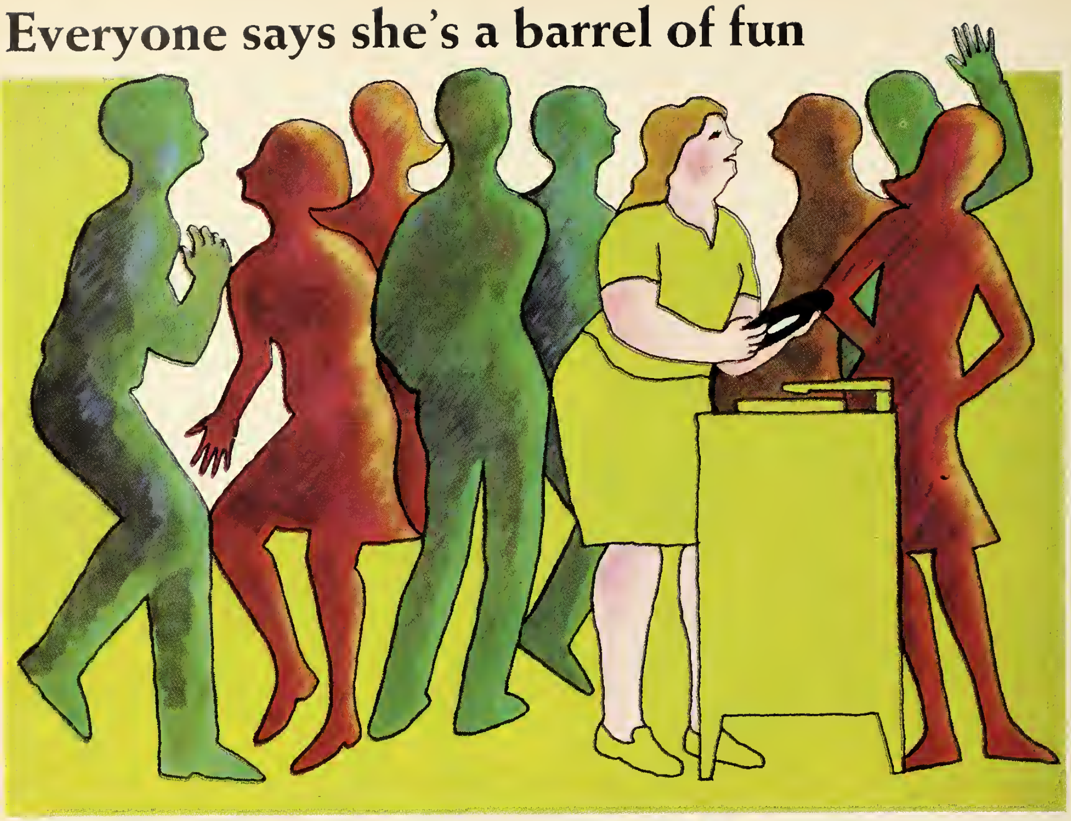
Roche Laboratories
Division of Hoffmann-La Roche Inc.
Nutley, New Jersey 07110

ROCHE

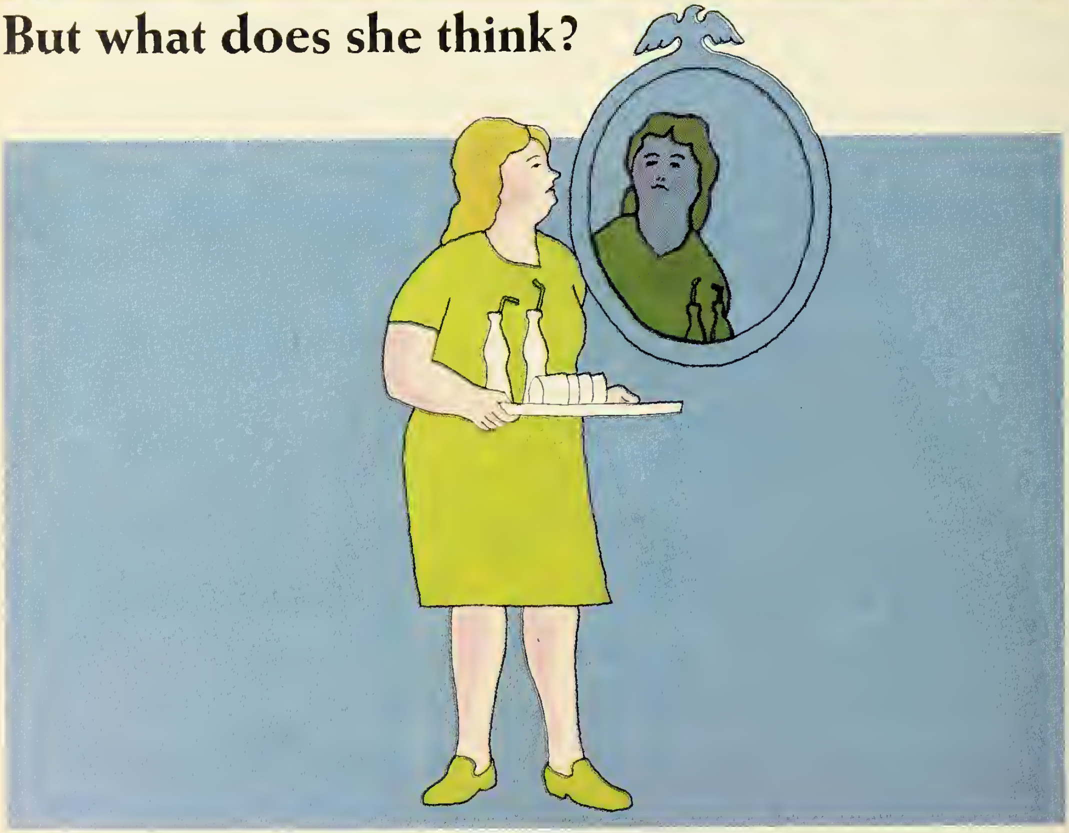
when there are bacterial invaders in the bladder, prostate or kidneys

Gantanol®
(sulfamethoxazole)

Everyone says she's a barrel of fun



But what does she think?



Many overweight patients can benefit from the appetite control provided by the sustained anorexigenic-tranquilizing action of BAMADEX SEQUELS: anorexigenic action of amphetamine; tranquilizing action of meprobamate; prolonged action through sustained release of active ingredients.

Bamadex® Sequels®

DEXTRO-AMPHETAMINE SULFATE (15 mg.) WITH MEPROBAMATE (300 mg.) SUSTAINED RELEASE CAPSULES

to help establish a new dietary pattern

Contraindications: Dextro-amphetamine sulfate: in hyperexcitability and in agitated prepsychotic states. Previous allergic or idiosyncratic reactions to meprobamate.
Precautions: Use with caution in patients hypersensitive to sympathomimetic compounds, who have coronary or cardiovascular disease, or are severely hypertensive.
Dextro-amphetamine sulfate: Excessive use by unstable individuals may result in psychological dependence.
Meprobamate: Careful supervision of dose and amounts prescribed is advised, especially for patients with known propensity for taking excessive quantities of drugs. Excessive and prolonged use in susceptible persons, e.g. alcoholics, former addicts, and other severe psychoneurotics, has been reported to result in dependence on the drug. Where excessive dosage has continued for weeks or months, reduce dosage gradually. Sudden withdrawal may precipitate recurrence of preexisting symptoms such as anxiety, anorexia, or insomnia; or withdrawal reactions such as vomiting, ataxia, tremors, muscle twitching and, rarely, epileptiform seizures. Should meprobamate cause drowsiness or visual disturbances, reduce dosage and avoid operation of motor vehicles, machinery or other activity requiring alertness. Effects of excessive alcohol consumption may be increased by meprobamate. Appropriate caution is recommended with patients prone to excessive drinking. In patients prone to both petit and grand mal epilepsy meprobamate may precipitate grand mal attacks. Prescribe cautiously and in small quantities to patients with suicidal tendencies.
Side Effects: Overstimulation of the central nervous system, jitteriness and insomnia or drowsiness.
Dextro-amphetamine sulfate: Insomnia, excitability, and increased motor activity are common and ordinarily mild side effects. Confusion, anxiety, aggressiveness, increased libido, and hallucinations have also been observed, especially in mentally ill patients. Rebound fatigue and depression may follow central stimulation. Other effects may include dry mouth, anorexia, nausea, vomiting, diarrhea, and increased cardiovascular reactivity.
Meprobamate: Drowsiness may occur and can be associated with ataxia; the symptom can usually be controlled by decreasing the dose, or by concomitant administration of central stimulants. Allergic or idiosyncratic reactions: maculopapular rash, acute nonthrombocytopenic purpura with petechiae, ecchymoses, peripheral edema and fever, transient leukopenia. A case of fatal bullous dermatitis, following administration of meprobamate and prednisolone, has been reported. Hypersensitivity has produced fever, fainting spells, angioneuratic edema, bronchial spasms, hypotensive crises (1 fatal case), anuria, stomatitis, proctitis (1 case), anaphylaxis, agranulocytosis and thrombocytopenic purpura, and a fatal instance of aplastic anemia, but only when other drugs known to elicit these conditions were given concomitantly. Fast EEG activity, usually after excessive dosage. Impairment of visual accommodation. Massive overdosage may produce drowsiness lethargy, stupor, ataxia, coma, shock, vasomotor and respiratory collapse.

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Atlantic City to Host '67 AMA Convention

Many Michigan physicians and Auxiliary members will be walking the famed Boardwalk when they go to Atlantic City, June 18-22 for the Annual AMA Convention.

There's quite a story behind the "Boardman Walk." Yes, that's what it could be called.

ATLANTIC CITY WAS a thriving little community of some 1,000 persons when something happened that perhaps created the impact that practically overnight vaulted the city into the position of the world's leading summer resort. Those who strolled the beach tracked sand into the hotel lobbies as well as into the railroad parlor cars, damaging the carpets of both.

Alexander Boardman, a conductor on the Camden and Atlantic Railroad, and Jacob Keim, operator of the Chester County House on New York Avenue, decided something should be done about it. A petition was circulated calling upon City Council to construct a wooden foot walk along the beachfront. City Council heard the call and on May 9, 1870, voted to build a walk, 10 feet wide, from Massachusetts to Missouri Avenues, a distance of about two miles.

As the city's tax income of the previous year was only $9,172.15 and the "Walk" was to cost about $5,000, Mayor John J. Gardner dug into his pocket and advanced the city $1,080 as a loan to get the work started.

This first Boardwalk sat on rows of posts about two feet above the beach. Made in short sections, it was removed each fall and stored in a barn. The Boardwalk enjoyed immediate popularity and it wasn't long before it was actually overflowing with strollers. The *Atlantic Review*, one of the resort's daily newspapers, on August 15, 1885, reported that "nearly every day somebody falls off the Boardwalk. In nearly every instance the parties have been flirting."

CONSEQUENTLY IT WAS quite obvious that the Boardwalk had to be made larger. The present structure, which is really the fifth Walk, is 60 feet wide and approximately 6½ miles long. At one time it was more than 8 miles in length but much was destroyed in the hurricane of 1944.

The early Boardwalk, frequently referred to as the "Eighth Wonder of the World," was copied by numerous other resorts. However, nowhere is there one that comes close in either size or variety of attractions. Seated on concrete and steel pilings, the Walk is made up of 2 by 4 inch planks, 16 feet long, of Douglas fir or long-leaf yellow pine. It wears out in about 12 years through pounding of feet, weather, and sand, and average maintenance cost is about $200,000 annually, exclusive of new construction contracts.

There are 84,200* undetected diabetics in Michigan

Most of these are probably among patients over 40; the overweight; relatives of diabetics, and mothers of large babies. By the time polyphagia, polyuria, polydipsia, pruritus or other overt symptoms of diabetes appear, damage may have been done that could have been minimized. DEXTROSTIX® gives you a reliable blood-glucose estimate in 60 seconds.

Why Wait?

Dextrostix
KEEP CAP TIGHT
AMES
25 STRIPS
Dextrostix
REAGENT

*Based on Statistical Report, U.S. Dept. Commerce, ed. 86, and Fisher, G. F., and Vavra, H. M.: Pub. Health Rep. 80:961 (Nov.) 1965.

Note: DEXTROSTIX is not meant to replace the more precise analytical laboratory procedures such as needed in glucose tolerance testing.

AMES COMPANY, Division Miles Laboratories, Inc., Elkhardt, Indiana, U.S.A. 42867

Ames

Sustained circulatory, respirator
and cerebral stimulation for th

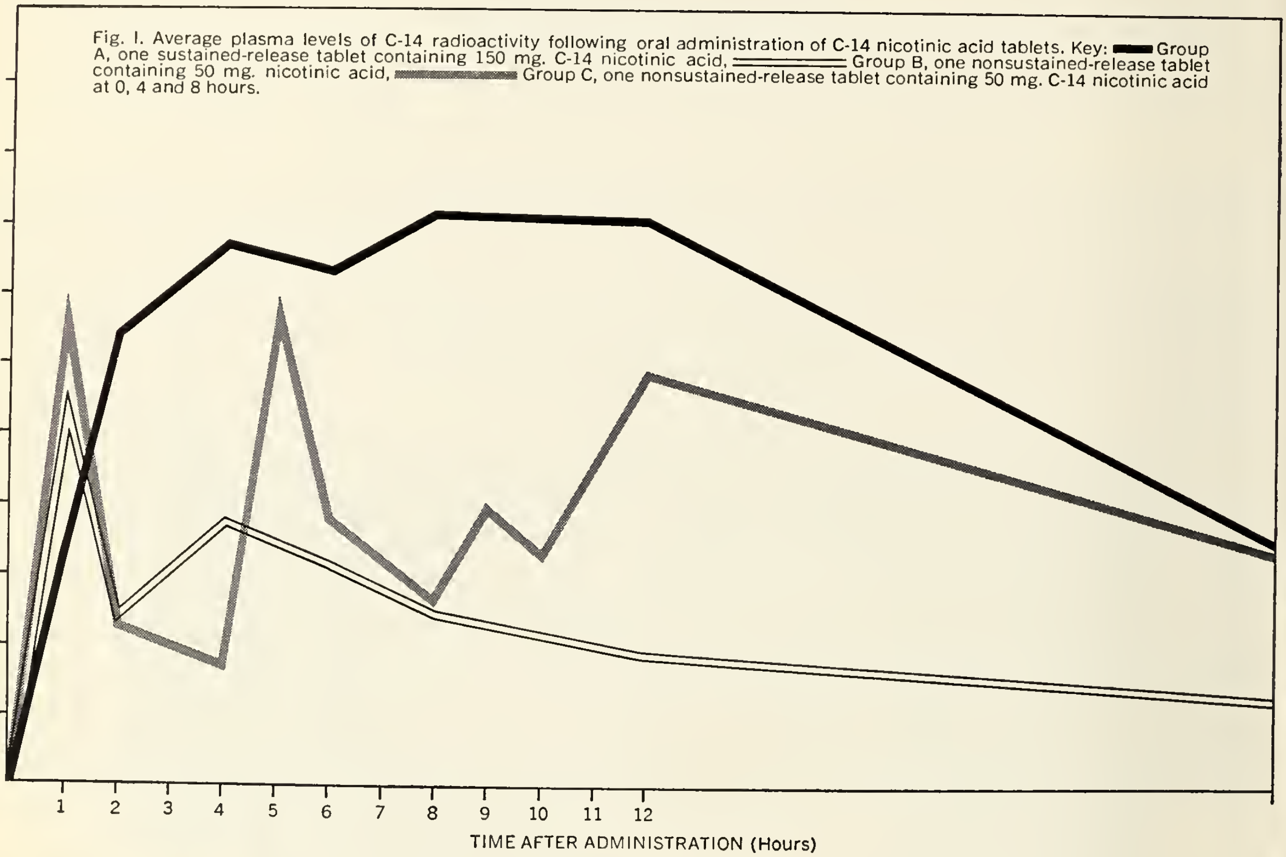

Fig. I. Average plasma levels of C-14 radioactivity following oral administration of C-14 nicotinic acid tablets. Key: ▬ Group A, one sustained-release tablet containing 150 mg. C-14 nicotinic acid, ═ Group B, one nonsustained-release tablet containing 50 mg. nicotinic acid, ▒ Group C, one nonsustained-release tablet containing 50 mg. C-14 nicotinic acid at 0, 4 and 8 hours.

(fewer absent doses by absent-minded patients)

Human volunteer subjects were administered Geroniazol TT tablets with the nicotinic acid component made radioactive with C-14. Plasma and urine samples were analyzed. (See Figures I and II) The radioactive tracer study substantiated the previous clinical evidence that the release of nicotinic acid from the Geroniazol TT tablet produced a gradual rise in plasma levels to a plateau for a total of 12 hours and more.

Such proven sustained activity makes the management of geriatric patients much easier by minimizing the possibility of neglected doses through absent-mindedness or senile confusion. Therapy *can* be continuous on a daily dose of only one Geroniazol TT tablet every 12 hours.

The gradual release of nicotinic acid in Geroniazol TT will provide the well-known peripheral vasodilatation needed in patients with deficient circulation and with a minimum amount (if any) of "flushing." Also, cerebrovascular circulation is complemented by pentylenetetrazol, long-established as a cerebral and respiratory stimulant.

Geroniazol TT improves the typical, unfortunate, signs of senile confusion. Patients become more alert,

ged and debilitated

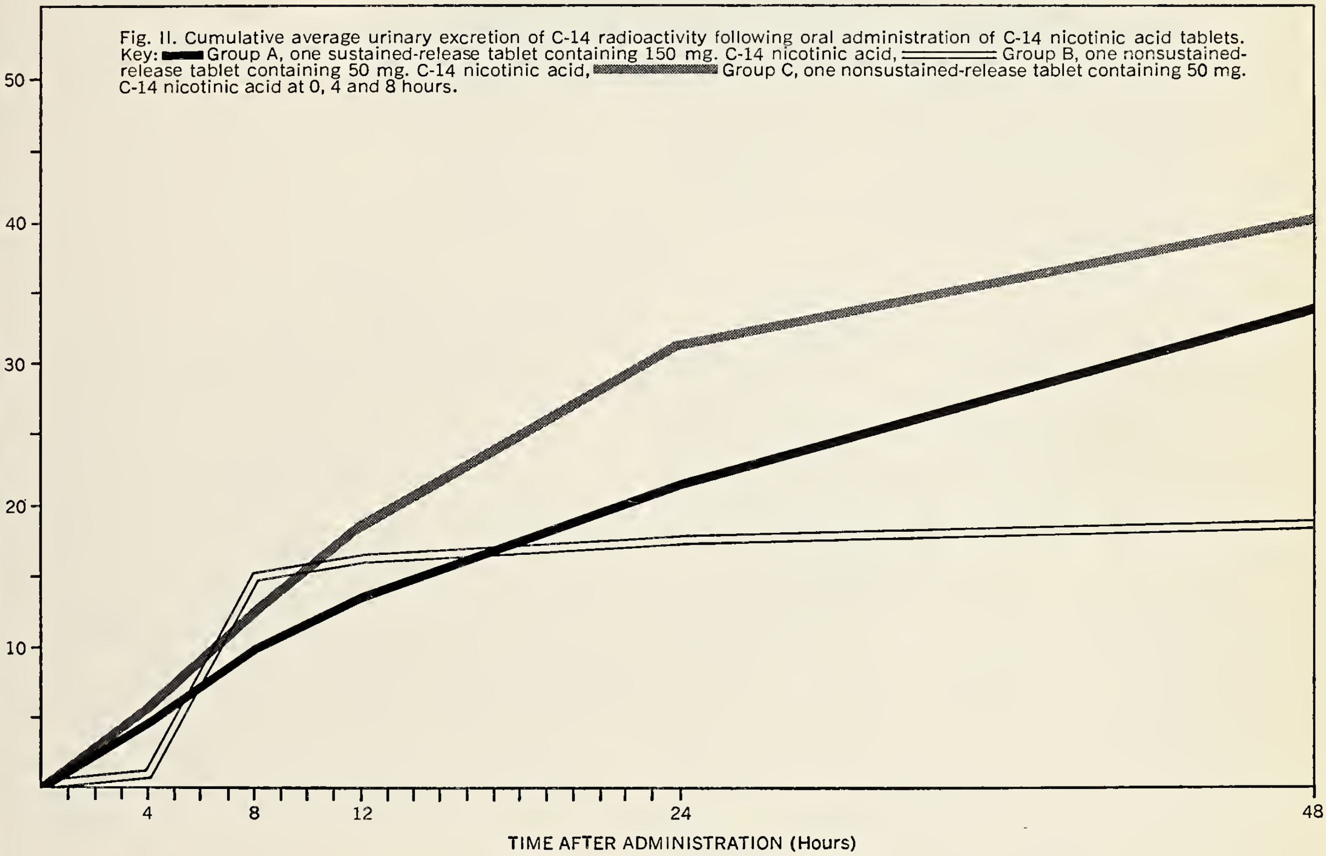

Fig. II. Cumulative average urinary excretion of C-14 radioactivity following oral administration of C-14 nicotinic acid tablets. Key: ▬ Group A, one sustained-release tablet containing 150 mg. C-14 nicotinic acid, ═ Group B, one nonsustained-release tablet containing 50 mg. C-14 nicotinic acid, ▨ Group C, one nonsustained-release tablet containing 50 mg. C-14 nicotinic acid at 0, 4 and 8 hours.

C-14 AS MILLIGRAMS NICOTINIC ACID EXCRETED
50
40
30
20
10
4
8
12
24
48
TIME AFTER ADMINISTRATION (Hours)

less confused and moody. Personal care, memory, emotional stability, social attention improve. Fatigue, apathy and irritability are reduced.

A prescription for 100 tablets of Geroniazol TT will permit your patients to enjoy the benefits of time-prolonged nicotinic acid/pentylenetetrazol therapy, at an economical price. Dosage is only one tablet every 12 hours.

Contraindications: There are no known contraindications.

Precautions: Exercise caution when treating patients with a low convulsive threshold.

Side Effects: Side effects are rarely encountered, however due to the vasodilatation effect of nicotinic acid, transitory mild nausea, flushing, tingling and pruritus are possible.

Dosage: One tablet every 12 hours.

Supplied: Prescribe bottles of 100 tablets, to take advantage of recent price reduction.

References: 1. Report by Nuclear Science & Engineering Corp., Pittsburgh, Pa., in files of Philips Roxane Laboratories. 2. Connolly, R.: W. Virginia Med. J. *56*:263 (Aug.) 1960. 3. Curran, T. R., and Phelps, D. K.: Am. Pract. & Digest Treat. *11*:617 (July) 1960.

Geroniazol® TT

nicotinic acid 150 mg., pentylenetetrazol 300 mg.
Tempotrol® Time Controlled Tablet

"First with the Retro-Steroids"
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Shown during a taping session of the MSMS radio program "Prescription for Health" are, left to right, William Ledger, M.D., John R. G. Gosling, M.D., and George H. Lowry, M.D., all of Ann Arbor.

MSMS Reaches Thousands Through Weekly Radio Tapes; WUOM Helps Inform General Public About Good Medical Care

While a watch ticks on a table and production engineers give signals from behind a glass panel, Michigan physicians continue to make MSMS radio tapes on medical subjects for the general public.

Under the guidance of John R. G. Gosling, M.D., Chairman of the MSMS Scientific Radio and Television Committee; William Ledger, M.D.; and George H. Lowry, M.D., all of Ann Arbor, the Committee produces two tapes each week which are sent to over 40 stations throughout the state.

To fit the programming needs of Michigan stations, both a 15-minute program called "Prescription for Health" and a five-minute program called "Medical Talks" are produced. Doctor Gosling explains that the average physician is a novice at radio work; he looks at the microphone as if it were a cobra, not a means of communicating with people. Usually, however, he soon warms up to the task. Owing to this reticence, Doctor Gosling tells physicians not to come with a prepared script.

"A prepared script plus the coldness of the microphone are a deadly combination," he says, "and the result can be a terribly dull talk."

"We try to get the doctors to relax as much as possible and realize that they are talking with people, not a machine," he adds.

After physicians discuss selected topics, the tapes are duplicated by WUOM, the University of Michigan's radio station, and mailed to stations all over the state.

"The response we get to the tapes is excellent," says Ed Burroughs, Station Manager at WUOM. "As far as we can tell the stations appreciate receiving them and use them regularly."

A recent survey conducted by MSMS corroborates this view. When station managers say, "We find the program to be informative and quite interesting" and "We wish there were more of them," it is a good indication that Michigan people appreciate the sacrifice of the doctors who give their time to communicate the latest medical findings in a meaningful way.

For the Michigan physician who wants to further education about medicine in his community, these radio tapes are an effective, ready-made tool which can enhance his involvement in the community.

To have these tapes used on radio programs in his own community the physician can:

(1) Call his local radio station manager and ask if he is receiving either "Medical Talks" or "Prescription for Health" from WUOM in Ann Arbor.

(2) If he is not receiving the tapes, ask him if he would like to have samples of 15-minute and five-minute tapes produced by physicians interested in conveying the best medical knowledge to laymen. Emphysema, heart disease, air pollution, birth control, psychiatry, poisoning — these are just a few of the topics discussed.

(3) Point out that there is no charge for the recordings.

(4) If the station manager is interested in the samples tell him to write: Ed Burroughs, Program Director, WUOM, University of Michigan, Ann Arbor.

(5) Follow up with a call two weeks later to find out if he has received the samples.

Soyalac
SOLVES THE PROBLEM

for the infant who requires a milk-free diet!

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CONCENTRATED
LIQUID
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For Infants
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- Soyalac satisfies! Baby is happy, mother is grateful, doctor is gratified.
- The nut-like taste is pleasing. Infants readily accept this hypoallergenic formula that is completely fibre-free. An exclusive process results in a consistency much like milk.
- Soyalac is strikingly similar to mother's milk in composition and ease of assimilation. Clinical data furnish evidence of Soyalac's value in promoting normal growth and development.
- Excellent for regular infant feeding, too—and for growing children and adults.

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Mount Vernon, Ohio, U. S. A.

Free Booklet and Samples

A request on your professional letterhead or prescription form will bring to you complete information and a supply of samples.

mediscene

Apr. 3 – Beaumont Lecture, Wayne County Medical Society Building, Detroit

Apr. 4 – Annual Membership Conference, Michigan League for Nursing, Kellogg Center, Michigan State University, East Lansing

Apr. 19 – The Council, MSMS Headquarters, East Lansing

Apr. 19-21 – University of Michigan Medical Center Sesquicentennial Symposium on the Prevention of Highway Injury, the University of Michigan Medical School, Ann Arbor

Apr. 26 – Muskegon Trauma Day, Muskegon

May 1-3 – The Initial Management of the Acutely Injured Conference, Rackham Lecture Hall, the University of Michigan, Ann Arbor

May 7-12 – American Psychiatric Association, Cobo Hall, Detroit

May 12 – MSMS Conference on Medical News Writing, the University of Michigan Medical Center, Ann Arbor

May 17 – Annual Wayne State University Medical School Alumni Day, Detroit

May 17 – Muscle Symposium, Wayne County Medical Society Building, Detroit

May 17-19 – Michigan Public Health Association Conference, Pantlind Hotel, Grand Rapids

May 18-19 – Symposium on Pediatric Trauma (Physical and Psychosocial), Children's Hospital Tenth Annual Clinic Days, David Whitney House, Detroit

May 18 – Michigan Chapter of the American College of Surgeons, the University of Michigan Medical School, Ann Arbor

May 21-27 – Michigan Week

May 25 – MSMS Conference on Medical Aspects of High School Sports, the University of Michigan Medical Center, Ann Arbor

May 31 – The Council, MSMS Headquarters, East Lansing

June 3-4 – Michigan Kidney Foundation Symposium on Kidney Diseases, University of Michigan Medical Center, Ann Arbor

June 8-10 – 74th Annual Meeting of Michigan Upper Peninsula Medical Society, Escanaba

June 18-22 – 1967 AMA Annual Convention, Atlantic City, New Jersey

June 18 – Annual Convention of the Woman's Auxiliary to the American Medical Association, Atlantic City, New Jersey

July 13-15 – The Council, Grand Hotel, Mackinac Island

Aug. 25 – The Council, MSMS Headquarters, East Lansing

Sept. 14-16 – Annual Meeting of the American Thyroid Association, the University of Michigan Medical School, Ann Arbor

Sept. 24-26 – MSMS House of Delegates, Black and Silver Room, Civic Auditorium, Grand Rapids

Sept. 26-27 – MSMS Woman's Auxiliary, Pantlind Hotel, Grand Rapids

Sept. 27 – MSMS Dinner Dance, Pantlind Hotel, Grand Rapids

Sept. 27-29 – MSMS Annual Scientific Session, Civic Auditorium, Grand Rapids

Sept. 27-28 – Michigan State Medical Assistants Society Convention, Mr. President Motel, Grand Rapids

Sept. 29-Oct. 1 – American Academy of Child Psychiatry, the University of Michigan Medical School, Ann Arbor

Oct. 5-7 – Medical School Alumni Reunion, the University of Michigan Medical School, Ann Arbor

Oct. 9-13 – International Conference on Leukemia and Lymphoma, the University of Michigan Medical School, Ann Arbor

Oct. 15-21 – Community Health Week

Oct. 27-28 – Regional Meeting, American College of Physicians, the University of Michigan Medical School, Ann Arbor

Nov. 2 – Southwestern Michigan Clinic Day

Nov. 8 – The Council, MSMS Headquarters, East Lansing

Nov. 15-17 – International Conference on Fertility and Family Planning – A World View, the University of Michigan Medical School, Ann Arbor

Nov. 26-29 – AMA Clinical Convention, Houston

Nov. 26-29 – Conference on Genetics in Medicine, sponsored by the American College of Physicians, the University of Michigan Medical School, Ann Arbor

Dec. 13 – The Council, MSMS Headquarters, East Lansing

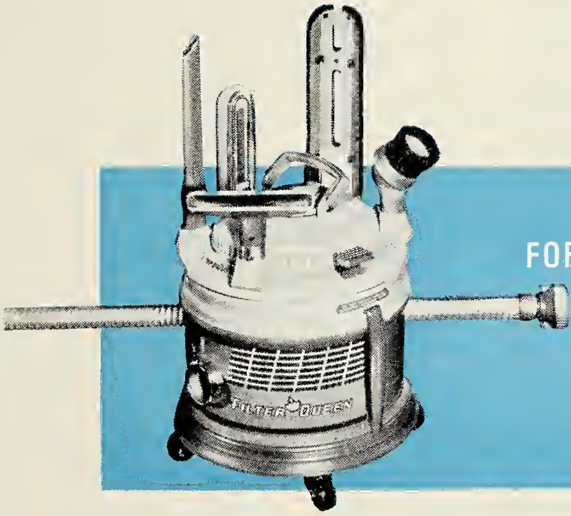
People keep asking us:

"Why do you call the

FILTER QUEEN

a sanitation system

instead of a vacuum cleaner?"



FOR THE BIG DIFFERENCE
SEE THE NEXT TWO PAGES

Only FILTER

(The problem of overcoming increasing air pollution is one of the most urgent facing your institution and the entire communit today. How FILTER QUEEN, through its unique, patented Filter Cone helps combat air pollution while it cleans, should b of vital interest to every member of your hospital staff. We hope you will mark these pages and route them accordingly.

Dramatic smoke test shows how FILTER QUEEN removes air-borne contaminants and offensive odors

MEMORIAL HOSPITAL

1. Every hospital has its dust and odor problems.

FIG T MEMORIAL HOSPITAL
OF THE MEDICAL STAFF

2 That's when a FILTER QUEEN is needed.

NT MEMORIAL HOSPITAL

3. FILTER QUEEN quickly removes air-borne contaminants while it vacuun

QUEEN helps purify he air while it cleans!

hat is why we call FILTER QUEEN *sanitation system instead of a vacuum cleaner!*

FEW OF THE HUNDREDS OF HOSPITALS NOW USING FILTER QUEEN:

no Community Hospital	Fresno, California
y Memorial Hospital	Atlanta, Georgia
t Hospital	Columbus, Ohio
y County General Hospital	Paris, Tennessee
y Ford Hospital	Detroit, Michigan
Cross Hospital	Ft. Lauderdale, Florida
Angeles City Genl. Hospital	Los Angeles, California
. Memorial Hospitals	Boston, Massachusetts
cal College of Virginia	Richmond, Virginia
nwestern Hospital	Minneapolis, Minnesota
look Hospital	Summit, New Jersey
Huron Hospital	Port Huron, Michigan
n's Hospital	Honolulu, Hawaii
ohn's Memorial Hospital	Anderson, Indiana
ester City Hospital	Worcester, Massachusetts

The engineers who perfected the FILTER QUEEN machine clearly recognized that all bag-type vacuum cleaners cannot operate with maximum efficiency because they use a porous bag. So, to make suction cleaning action truly efficient, they had to find a way to overcome the leakage in dust and dirt that so often occurs whenever a porous bag is used.

The highly successful result was an entirely *different* air flow principle, known today as Cyclonic Cleaning Action. By using Cyclonie Cleaning Action, FILTER QUEEN'S designers succeeded in not only collecting the dust and dirt normally collected by vacuuming; they also succeeded in trapping almost invisible airborne contaminants that formerly escaped back to repollute the air.

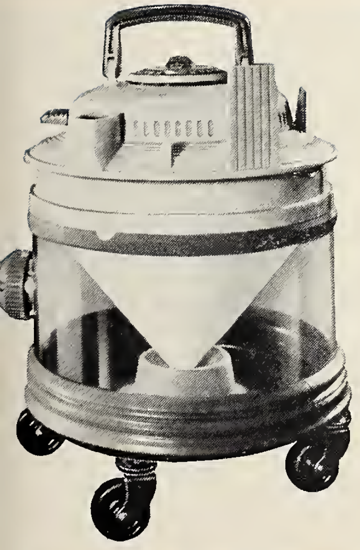
The difference between FILTER QUEEN'S remarkable Cyclonic Cleaning Action and ordinary vacuuming becomes immediately apparent when the Smoke Test pictured at left is made. Smoke, other contaminants and offensive odors virtually disappear. The room not only smells clean—it *is* clean!

The key to this almost magic action is FILTER QUEEN'S patented Sanitary Filter Cone. (See illustration.) Inrushing air, laden with dirt and dust, is deflected by a patented inlet guide as it enters the FILTER QUEEN container, then is whirled away by centrifugal force. Foreign matter heavier than air is forced to the bottom and the sides.

Clean air is filtered through our exclusive Sanitary Filter Cone *above* floor level, leaving smoke as well as dirt and dust trapped in the container. That is why hundreds of hospitals and other institutions insist on the FILTER QUEEN Sanitation System over any type of vacuum cleaner.

Ask your local FILTER QUEEN Distributor to make FILTER QUEEN'S dramatic Smoke Test in your hospital. Then you will *KNOW* why we proudly call it a FILTER QUEEN Sanitation System instead of a "vacuum cleaner."

DOCUMENTARY PROOF: *We would like to send you, with our compliments, an article entitled "Air Hygiene for Hospitals" which appeared in the Journal of the American Medical Association. In this article it is explained what happened to airborne contaminants when a FILTER QUEEN was used in a series of rigidly controlled tests conducted at the Harvard Medical School. Write to Health-Mor, Inc., 203 North Wabash Ave., Chicago, Illinois 60601*



The FILTER QUEEN sanitary filter cone is a scientifically-designed dust separator, composed of a special long-fibred mat of pure cellulose, chemically treated to give it the necessary strength and air-filtering characteristics.

FILTER QUEEN is a product of HEALTH-MOR, INC.,
203 North Wabash Ave., Chicago, Ill. 60601.
In Canada: Filter Queen Corp. Ltd.,
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In Mexico: Industrias Filter Queen, S. A.,
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You'll find FILTER QUEEN Sanitation Systems listed in your Yellow Pages under "Vacuum Cleaners". (That's because FILTER QUEEN is fast replacing ordinary vacuum cleaners.)

FILTER QUEEN

The cleaning method that does so much more it has to be called a Sanitation System.

New Sex Education Film Produced by Kalamazoo Physician Lauded by Calderone, Youths, Parents

BY PETER HOHEISEL
OF THE MSMS STAFF

Sex, one of the oldest and most vital interests of the human race, has today been demythologized, analyzed, and popularized so any person living in our enlightened age can talk freely and openly about it.

And yet the current demands for a new half-hour color film produced by Frederick Margolis, M.D., a Kalamazoo pediatrician, called "Parent to Child about Sex" are so heavy that bookings for the film are scheduled months in advance.

Every day letters from church groups, PTA's, service clubs — almost every association of adults — pour into Doctor Margolis's office praising the film and asking how it can be obtained.

"PARENT TO CHILD ABOUT SEX" uses nonprofessional actors, many of them Kalamazoo residents, to communicate human and realistic attitudes toward sexuality. A girl discussing menstruation with her doctor, a boy talking about masturbation, a mother explaining to her daughter how the baby gets inside the mother, these and others are the situations the film explores.

Despite all the chatting over cocktails about sex, there is apparently a need, a hunger, an almost desperate desire on the part of parents to learn how to communicate with their children about sex. "Parents want to learn, but they don't know where to start. That's where this film comes in," explains Doctor Margolis.

"Most films on sex use either what we call the nuts-and-bolts approach (the mechanics of human reproduction) or an overly sentimentalized view," Doctor Margolis continued.

"We want to convey attitudes and feelings so that people learn to associate sex, not with promiscuity, venereal disease, and something dirty, but with a positive, good, essential part of human living," Doctor Margolis continued.

"We try to show how to handle the child's questions and how to build a comfortable parent-child relationship which will be carried over into older age levels to help prevent later problems. To get things started—communication, honesty—that's what the film is about. It's not the whole answer.

"WE OFTEN GIVE OUR children the impression that before marriage everything associated with sex is bad. Then they marry. Overnight their attitude is supposed to change and sex is to be a

Dr. Margolis

wonderful, joyful part of the marriage relationship. But it just doesn't work that way. Attitudes begun in early childhood just don't change that easily."

Having produced such a film apparently exposes Doctor Margolis to a good deal of professional kidding. A colleague passed by while we were discussing the film at lunch and asked, "How's the sex fiend today?" But the doctor just laughed and accepted the good-natured barbs of an associate, for he is deeply pleased because people, hundreds and thousands of them, all over the country are being helped by the film.

"A woman in my office this morning told me," he continued, "Because of the film I feel I can do a more complete job as a mother.' "

Comments from high school students who have seen the film range from "Somebody's talking to us like we're worth talking to," to "It was exciting to find out how a baby gets started."

The film has been enthusiastically received by laymen. Protestant, Catholic and Jewish leaders have endorsed it.

Gynecologists and obstetricians praise it. In fact, the film will be seen by about 5000 doctors at the annual April meeting of the American College of Obstetricians and Gynecologists in Washington, D.C.

MARY CALDERONE, M.D., Executive Director of SIECUS (Sex Information and Education Council of the United States), says, "The film demonstrates how the whole topic of sex should be treated from the time the child is three or four: warmly, simply, objectively — as fully as the child's maturity level indicates — but never clinically, even by the doctor, nor casually as if sex were 'just another appetite like eating,' which it is not."

For any doctor who wants to become more involved in the health education of his community, "Parent to Child about Sex" can be an effective means. "Any PTA or church group would be delighted to have a doctor offer to show the film and lead the discussion afterwards," says Doctor Margolis. "It's a good way for the doctor to get sound medical education to the public. He's a professional and people appreciate his interest."

"In one sense the doctor can do more good with the film than he can in private discussion with the patient," Doctor Margolis concluded. "When I explain something to parents in my office, for example, how they should not reprimand a child for touching his genitals, they often get upset and put up defenses. When those same persons are in an audience of 300, they can react in any way they want and not feel embarassed."

"Parent to Child About Sex" can be rented for $20.00 or purchased for $230.00 from Wayne State University. Any physician who is interested in reviewing it should write to: Audio-Visual Utilization Center, Wayne State University, 5454 Cass Ave., Detroit, 48202.

Tommy N. Evans, M.D., who is in the film, discusses it with Mrs. Henry Scovill, President of the state Woman's Auxiliary, after showing "Parent to Child about Sex" to the Auxiliary midwinter conference in Detroit.

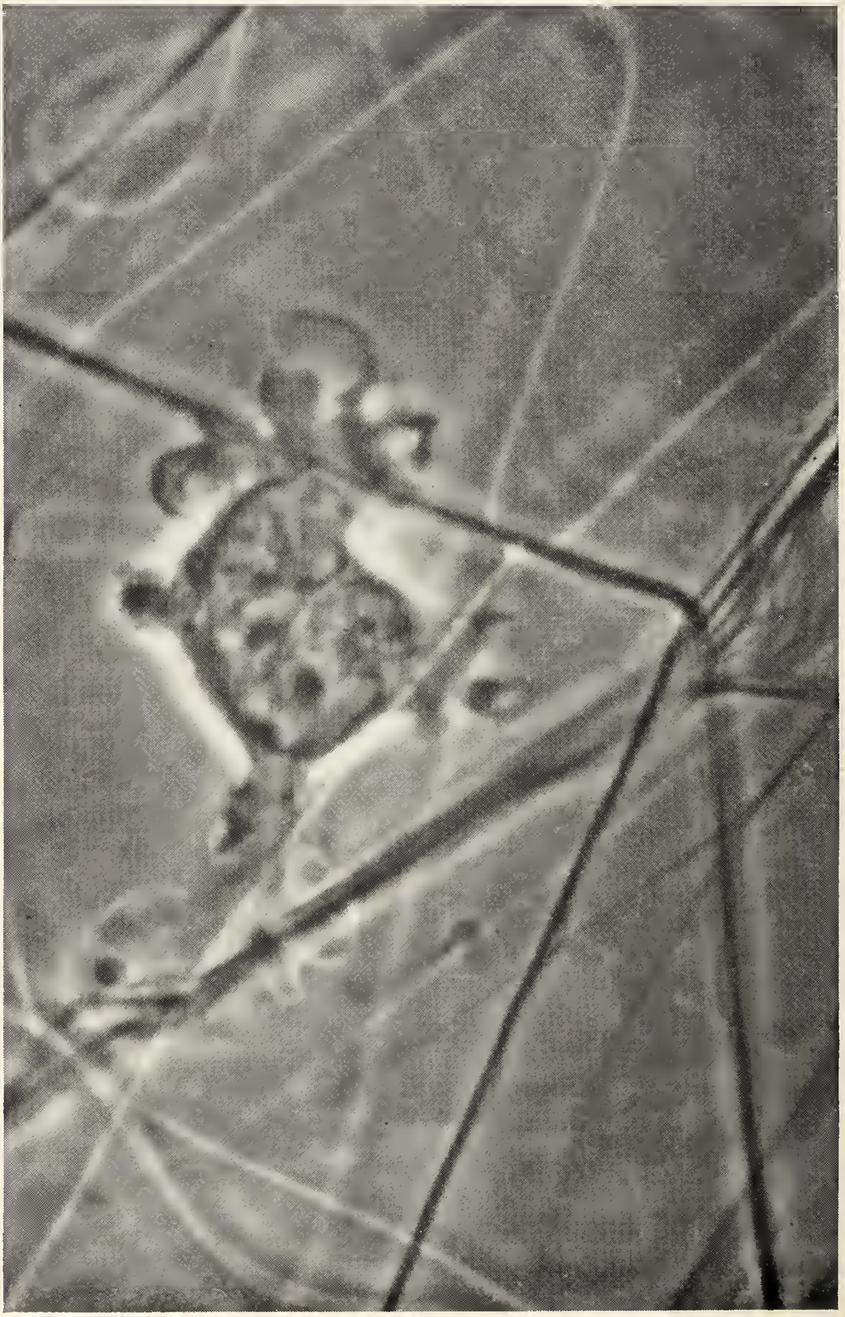
INFLAMMATION:

A cellular fight for life

A SYNTEX REPORT based on recently developed hypotheses about topical corticosteroids, including the cellular theories of inflammation by Thomas F. Dougherty, Ph.D., University of Utah.

You are looking at a fibroblast fighting for life. This cell—one of the most common found in connective tissue—has literally been poisoned by cytotoxins released from other cells that have ruptured. Soon, if the abnormal activity of this fibroblast does not cease, it, too, will rupture and die—one more casualty in the inflammatory wave of destruction precipitated by injury.

Until a short time ago no one had ever witnessed such a scene at the cellular level. Now, through advanced cinemicrographic techniques, it is possible to view and photograph the inflammatory process as produced experimentally in living animal tissue. This method permits new insight into the mechanism of inflammation and the role of corticosteroids in therapeutic management. Equally important, these techniques shed new light on factors that may make one corticosteroid more effective than another—factors that can be correlated with other chemical, biologic, and clinical parameters.

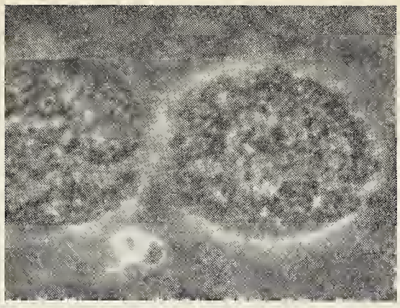


Visual evidence of how corticosteroids influence the inflammatory reaction

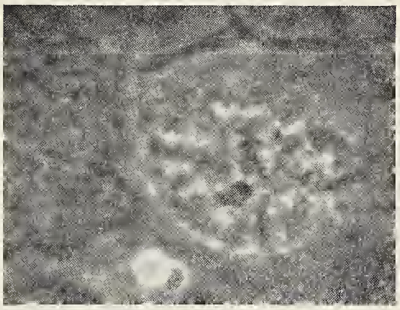
Working with phase-contrast cinemicrography on living animal tissue, Doctors Thomas F. Dougherty and David Berliner of the University of Utah College of Medicine have actually filmed cellular events that occur during the inflammatory reaction. This remarkable study* and additional work by these investigators, as well as by others, have established a new theoretical biologic basis for the antiinflammatory effect of the corticosteroids. (It must be noted that other theories, such as the lysosome or so-called "suicide bag" theory, have been postulated, although it is quite likely that there are more similarities than differences among the various theoretical models.)

The inflammatory wave of destruction

In this investigation an injurious injection of gelatin is used to set off an inflammatory reaction in living mouse tissue. What follows is a wave of destructive cellular activity that comprises the inflammatory response to injury. Mast cells (which contain heparin, serotonin and histamine) take up water, swell and rupture, releasing their contents, which are toxic outside the mast cell wall. These toxins, in turn, cause disintegration of other cells (such as fibroblasts) and the release of additional toxic material. Capillaries, too, take up water and leak unformed blood elements, causing edema. And polymorphonuclears, lymphocytes and perithelial cells invade the inflamed site. As a result of all these changes, the cellular environment reaches a state of turmoil.



Phase-contrast microscopy showing mast cell before injury.

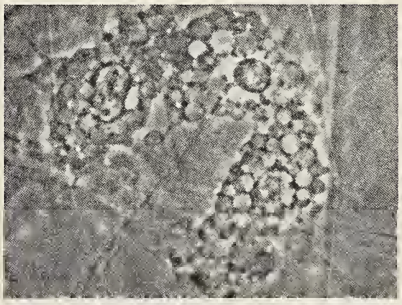


Mast cell (after injury) has broken up and released cytotoxins.

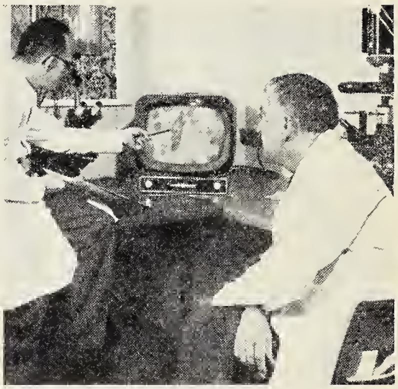
How corticosteroids change the picture

Corticosteroids appear to virtually stop the abnormal cellular activity that constitutes the inflammatory reaction. This permits the body's natural resources to clear up the inflamed area and repair the damaged tissue. This interpretation is supported by the fact that when the injurious gelatin solution is injected simultaneously with a corticosteroid – Synalar (fluocinolone acetonide) – the inflammatory pattern simply does not develop.

Fibroblast in high state of activity, much distorted.



Mast cells showing effects of corticosteroid action: cells are normal in size, shape and activity.



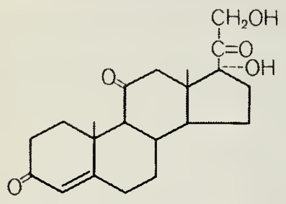
In summarizing his study Doctor Dougherty states: "...we also feel this work may explain why one corticosteroid helps a patient more rapidly and effectively than another. If it does, it is because one corticosteroid is the fastest, most effective inhibitor of the series of inflammatory events at the tissue level."

A New View of Corticosteroid Action in Inflammatory Dermatoses, a film based on this study, is now available from your Syntex representative.

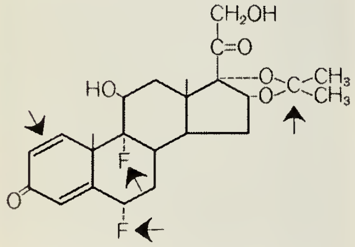
See last page for contraindications, precautions, side effects and dosage.

How advances in chemical design have achieved greater steroid potency

The chemical modification of corticosteroid molecules from the advent of hydrocortisone to the development of Synalar (fluocinolone acetonide) is a prime example of how biochemists can "design" to increase therapeutic activity and minimize undesirable side actions. Below, for example, we see the important changes that were made in reference to the hydrocortisone molecule to produce fluocinolone acetonide, one of the most active of all topical corticosteroids. As a result, a 0.01% preparation of Synalar (fluocinolone acetonide) has been reported to do the work of a 1% hydrocortisone product containing 100 times more cortiscosteroid. And it can often do it more effectively.



Hydrocortisone

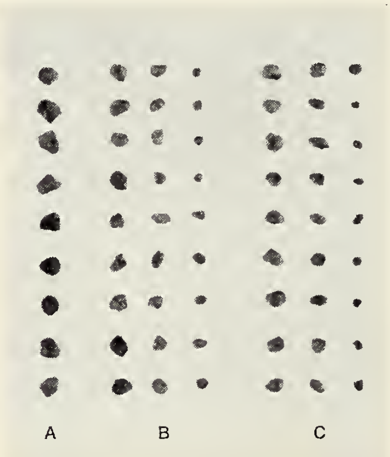


Fluocinolone Acetonide (Synalar)

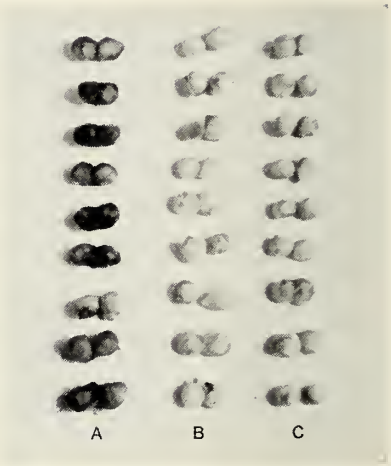
- ☐ *a double bond between carbons 1 and 2*
- ☐ *fluorine substitutions at* both *the 6-α, and the 9-α positions*
- ☐ *the addition of the acetonide at the 16-α, 17-α positions, thus providing one of the most potent topical corticosteroids available.*

How bioassay tests are used to "predict" therapeutic potential

Biologic assays are another tool used by researchers to help establish the relative activity of corticosteroids. To date no single method of assaying corticosteroid activity has emerged as the ideal "yardstick" for predicting therapeutic potential. Taken together, however, these methods have proved useful. When such tests are run on various corticosteroids, a definite order of corticosteroid activity becomes evident. Compounds with the highest order of activity may be expected to merit clinical trial to establish their high therapeutic potential. When assayed by these methods, fluocinolone acetonide (Synalar) emerges as one of the most active topical corticosteroids, milligram for milligram, available for clinical application today.



THE THYMUS INVOLUTION ASSAY[1-4] is run on adrenalectomized rats. The sizes of the glands are measured, and the degree of involution caused by the steroid is determined as an indication of its potency. In the above photo, the comparative involution of thymus glands achieved with hydrocortisone and Synalar (fluocinolone acetonide) is shown. Untreated controls (A) show normal size. Group B — injected with 1, 2 and 4 mg. of hydrocortisone — show progressively smaller thymuses as does Group C — injected with fluocinolone acetonide — but with only 1/500th the dose of hydrocortisone.



THE ANTIGRANULOMA ASSAY[1-4] also utilizes adrenalectomized rats. Granulomas are induced by subcutaneous implantation of cotton pellets on either side of the thorax. The degree of granuloma inhibition achieved by a steroid reflects its potency. The above photo shows the inhibition of granuloma formation achieved with hydrocortisone and Synalar (fluocinolone acetonide). Untreated controls (A) show large, red granulomas adhering to the pellets. Group B, receiving hydrocortisone and Group C, receiving fluocinolone acetonide, show little, if any, granuloma formation. Fluocinolone acetonide produced the same effect as hydrocortisone with only 1/500th the dose. This assay, as well as the thymus involution assay, measures systemic rather than topical corticosteroid activity. Nevertheless, results by these methods correlate well with other assays and with the milligram potencies of topical steroids in current clinical use.

Worldwide clinical experience confirms the predictable therapeutic potential of Synalar

It is particularly gratifying that the promise of the advanced chemical design and high order of bioassay activity of Synalar (fluocinolone acetonide) has been confirmed by widespread therapeutic application. Indeed, the impressive clinical response rate of Synalar has been documented in no fewer than 232 papers from 22 countries.

Representative Clinical Results with Synalar*

Efficacy Documented in over 4,000 Patients

Condition	Number of Publications	Number of Patients	Significant Improvement†
Contact Dermatitis	27	750	713
Eczematous Dermatitis	21	472	409
Seborrheic Dermatitis	18	442	426
Atopic Dermatitis	24	460	426
Psoriasis	36	1,699	1,510
Neurodermatitis	18	351	324
Total	144	4,174	3,808

*Complete bibliography on request.

†Expressed by the authors as excellent, very good, good, complete remission of inflammation, etc.

PRESCRIBING INFORMATION

For initiation of therapy: Cream 0.025%, 5 and 15 Gm. tubes, 425 Gm. jars; *for emollient effect:* Ointment 0.025%, 15 Gm. tubes; *for maintenance therapy:* Cream 0.01%, 15 and 45 Gm. tubes, 120 Gm. jars; *for intertriginous or hairy sites:* Solution 0.01%, 20 cc. and 60 cc. plastic squeeze bottles; *for infected inflammatory dermatoses:* Neo-Synalar® Cream (0.025% fluocinolone acetonide, neomycin sulfate, equivalent to 0.35% neomycin base), 5 and 15 Gm. tubes.

CONTRAINDICATIONS: Tuberculous, fungal, and most viral lesions of the skin, (including herpes simplex, vaccinia, and varicella). Not for ophthalmic use. Contraindicated in individuals with a history of hypersensitivity to any of the components. PRECAUTIONS: Synalar preparations are virtually nonsensitizing and nonirritating. However, the solution may produce burning or stinging when applied to denuded or fissured areas. In some patients with dry lesions, the solution may increase dryness, scaling or itching. While topical steroids have not been reported to have an adverse effect on pregnancy, the safety of their use on pregnant females has not absolutely been established. Therefore, they should not be used extensively on pregnant patients, in large amounts, or for prolonged periods of time. Prolonged use of any antibiotic may result in overgrowth of nonsusceptible organisms; if this occurs, appropriate therapy should be instituted. When severe local infection or systemic infection exists, the use of systemic antibiotics should be considered, based on susceptibility testing. SIDE EFFECTS: Side effects are not ordinarily encountered with topically applied corticosteroids. As with all drugs, however, a few patients may react unfavorably to Synalar under certain conditions. The neomycin in Neo-Synalar Cream rarely produces allergic reactions.

REFERENCES: 1. Lerner, L. J., Bianchi, A., Turkheimer, A. R., Singer, F. M., and Borman, A.: Anti-inflammatory steroids: potency, duration and modification of activities. Ann NY Acad Sci 116:1071 (Aug. 27) 1964. 2. Idem: Comparison of anti-granuloma, thymolytic and glucocorticoid activities of anti-inflammatory steroids. Proc Soc Exp Biol Med 116:385 (June) 1964. 3. Ringler, A.: Activities of adrenocorticosteroids in experimental animals and man, in Dorfman, R. I.: Methods of hormone research, New York, Academic Press, 1964. vol. III. pp. 234-280. 4. Gubersky, V. R.: To be published.

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[1] Bradley, J. E., *et al.*: J. Pediat. *38*:41 (Jan.) 1951.
[2] Bradley, J. E.: Mod. Med. *20*:71 (Oct. 15) 1952.
[3] Crunden, A. B., Jr., and Davis, W. A.: Am. J. Obst. & Gynec. *65*:311 (Feb.) 1953.

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Wayne State University's School of Medicine Alumni Association will present their 99th Annual Clinic Day and Alumni Reunion, Wednesday, May 17, in the Sheraton-Cadillac Hotel, Detroit.

Events of the day, beginning with an 8 a.m. registration, will include seven scientific programs during morning and afternoon sessions, the Association's annual meeting, and a complimentary luncheon.

The annual banquet will feature class reunions and a presentation of Golden Anniversary diplomas to the Class of 1917. Scholarship awards and other honors will be presented. A Dinner Dance will highlight the Reunion's social events.

Alumni and other doctors of medicine are cordially invited to participate in the Clinic Day Program. Banquet reservations may be made by writing Alumni House, Wayne State University, Detroit, Michigan 48202.

WAYNE STA

1967 CLINIC DA

&

ALUMNI REUNIO

MAY 17, 1967

SHERATON-CADILLAC HOTEL
DETROIT

DR. FRANCE

A DISTINGUISHED SERVICE CITATION will be awarded to C. Jackson France, M.D., in recognition of his outstanding contributions to the medical profession. A 1942 graduate of the School of Medicine, Dr. France is presently associate professor of clinical surgery at Wayne.

DR. PENDY

ALUMNI ASSOCIATION PRESIDENT John M. Pendy, M.D., will be chairman of the morning session of the Scientific Program. Dr. Pendy is a 1940 graduate of the Wayne State University School of Medicine where he now holds a clinical associate professorship.

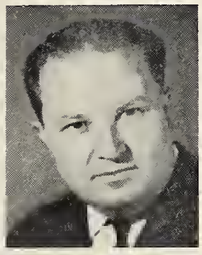
DR. RYAN

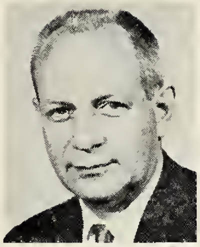
TOASTMASTER at the Reunion Banquet will be Jack Ryan, M.D., a 1955 graduate who is also a national collegiate debate champion. Dr. Ryan is a senior partner at the Memorial Clinic, Warren, Michigan, and, among other affiliations, is a member of the Board of Governors of WSU Medical Alumni.

IVERSITY MEDICAL ALUMNI ANNOUNCE-

SCIENTIFIC PROGRAM

MORNING SESSION


DR. MAMMEN


DR. SCHNEIDER

DR. EVANS

EBERHARD F. MAMMEN, M.D.: "Disseminated Intravascular Coagulation." Dr. Mammen, who received his medical degree in 1956 from the University of Giessen, Germany, is associate professor of physiology and pharmacology, Wayne State School of Medicine.

RICHARD C. SCHNEIDER, M.D.: "Athletic Injuries to the Spine." A professor in surgery, Wayne State School of Medicine, Dr. Schneider is also chief of the neurosurgery service, St. Joseph Mercy Hospital, Ann Arbor.

TOMMY N. EVANS, M.D.: "The Tunnel of Love." A 1945 graduate of Vanderbilt University School of Medicine, Dr. Evans is chairman of the Department of Obstetrics and Gynecology, Wayne State School of Medicine.

AFTERNOON SESSION

DR. GORMAN

DR. AXELROD

DR. GIKAS

JOHN G. GORMAN, M.D.: "New Vaccine Against Rh-Negative Disease." Dr. Gorman will lead off the afternoon Scientific Program, chaired by Mario Petrini, M.D. A graduate of the University of Melbourne Medical School, Australia, Dr. Gorman is presently blood bank director at the Presbyterian Hospital, New York.

ARNOLD R. AXELROD, M.D.: "The Inscrutable Red Cell." A 1944 graduate of the Wayne State School of Medicine, Dr. Axelrod is a practicing Detroit physician and a hematology consultant for several metropolitan Detroit hospitals.

PAUL W. GIKAS, M.D.: "Pathogenesis of Fatal Injuries in Automobile Accidents — The Influence of Design on Injury." Dr. Gikas received his medical degree from the University of Michigan in 1954. Among other positions, he is associate professor of pathology, WSU School of Medicine and chairman of the Committee on Highway Accident Prevention, Michigan State Medical Society.

Copies of Research Report No. 37 of Project '80 by the Michigan State University Cooperative Extension Service are available free of charge for interested MSMS members. Request it from Bulletin Office, MSU, East Lansing, Michigan 48823.

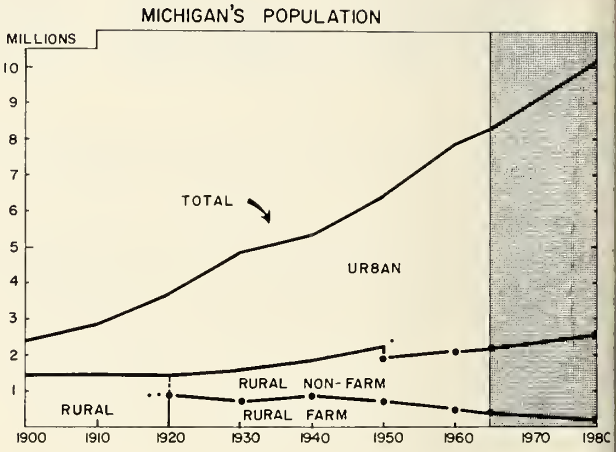
Offers Projections About Michigan Population for 1980

How many people will there be in Michigan by 1980? That question is of great importance to every physician and of greater importance to physicians serving on committees and projects concerned with facilities, medical education, health manpower, etc.

A new source of population data, complete with predictions, is the new *Research Report* number 37 from the Michigan State University Agricultural Experiment Station and Cooperative Extension Service.

The *Report* projects a population of 10.2 million by 1980 compared to 8.2 million in 1965. This will represent an increase of nearly 30 percent over 1960 and 23 percent over 1965.

"The increase will be approximately 100,000 persons in each of the next five years and will probably exceed 140,000 during the last few years of the 1970's," writes John F. Thaden, MSU demographer, in the *Research Report*. He notes:



Michigan's population by urbanization, 1900 to 1964 and projected to 1980.

"THE POPULATION OF Michigan nearly tripled in the fifty-year period between 1910 and 1960, comprising 3.1 percent of the nation's population in 1910 and 4.4 percent in 1960. Since 1940 Michigan's population has averaged 4.23 percent of the nation's total. On the assumption that this ratio will remain constant, the population of Michigan is estimated at 8.2 million in 1965 and can be expected to range between 9.8 and 10.6 million by 1980. The projection considered most likely is 10.2 million.

"The population growth is based on the assumption that the birth rate will rise gradually from the present 21.5 to 23.6 (births per 1,000 people per year) and that the death rate will remain constant at 8.8 per 1,000 persons per year. A slowly rising birth rate seems reasonable in view of the increasing number of persons who will be reaching marriageable age in the next dozen years.

"A general decline in fertility may be imminent. New fertility-control techniques enhance this possibility. A constant death rate of 8.8 seems reasonable in view of the fact that this has been the average over the past ten years and that the median age of the population will decline from the present 28.3 to about 26 or 25 by 1980."

MICHIGAN WAS ONE of twenty-three states that had a greater in-migration than out-migration during the 1950's. In that decade Michigan gained 162,232 net in-migration. In the late 1950's and early 1960's Michigan had a net out-migration to complicate the predictions for 1980. Professor Thaden blames the net migration of people out of the state "to the unemployment picture then." He explained in the MSU *Report*:

"As Michigan's economy moved into the mid-1960's the unemployment problem waned, and signs pointed to an end of the net out-migration. This illustrates the importance of economic conditions to population growth. The assumption made in the population projections to 1980 for Michigan is that in-migration and out-migration will be equal.

"Migration and differential rates of natural increase have also caused a redistribution of the population within Michigan. Prior to 1900 Michigan's center of population was pursuing a northwesterly, then a northerly course. After reaching a point 9.2 miles northwest of Ithaca in Gratiot County, the center of population has receded to a point approximately 15 miles southeast of Owosso in Shiawassee County. Dwindling logging operations in the northern sections of the state and the expanding automobile and heavy industry operations in the southern and southeastern parts have contributed to this redistribution. Currently, nearly 50 percent of Michigan's population resides in the three-county area (Wayne, Oakland, and Macomb) around Detroit."

MANY PHYSICIANS will be interested in the *Report's* comments about county population trends. Projections suggest that in 1980, 56 counties will have more people and 27 will have fewer. "Eleven of the declining counties will be in the Upper Peninsula and 16 will be in lower Michigan, mostly in the northwest sector," reports Professor Thaden. The age composition has a greater bearing today on the demands for medical care and is of interest to physicians as experts look ahead to 1980.

Population of Michigan, 1960, and projections to 1965, 1975 and 1980, by counties, according to University of Michigan Population Studies Center, as of January 1964.

County	Population	Projections			
	1960	1964	1970	1975	1980
na	6,352	6,400	6,100	6,400	6,500
r	9,250	8,600	7,800	7,700	7,700
gan	57,729	61,300	64,000	67,000	70,900
na	28,556	31,300	33,400	35,600	38,200
rim	10,373	9,900	9,200	9,000	9,100
ac	9,860	9,600	9,200	9,100	9,300
ga	7,151	6,500	5,800	5,600	5,500
y	31,738	33,600	35,100	36,700	30,000
	107,042	113,500	118,100	123,500	130,600
zie	7,834	7,400	6,800	6,600	6,600
rien	149,865	164,400	176,900	188,300	202,500
ch	34,903	36,100	36,800	38,200	39,700
oun	138,858	143,400	145,400	150,100	156,700
	36,932	40,700	44,100	47,000	50,700
rlevoix	13,421	12,900	12,200	12,200	12,200
boygan	14,550	14,400	14,100	14,200	14,700
pewa	32,655	33,200	33,300	34,200	35,400
e	11,647	11,900	12,100	12,400	13,000
ton	37,969	40,300	42,100	44,100	46,700
wford	4,971	5,300	5,400	5,600	5,900
a	34,298	33,600	32,500	32,800	33,600
kinson	23,917	22,600	21,100	20,900	21,000
n	49,684	53,300	56,200	59,100	63,000
net	15,904	14,900	14,100	13,800	13,900
esee	374,313	413,400	450,800	494,600	540,000
lwin'	10,769	11,100	11,200	11,600	11,900
ebic	24,370	22,300	20,000	19,600	19,300
d Traverse	33,490	34,800	35,700	37,000	38,900
tiot	37,012	37,500	37,300	38,200	39,500
sdale	34,742	34,900	34,500	35,100	36,200
ghton	35,664	32,400	29,200	28,600	28,100
on	34,006	33,200	31,800	32,000	32,400
ham	211,296	238,000	267,000	298,600	331,900
a	43,132	44,200	44,400	45,700	47,400
o	16,505	19,500	22,800	25,300	28,400
	17,184	16,300	15,200	15,200	15,200
ella	35,348	37,700	39,300	41,200	43,600
son	131,994	140,700	147,100	154,200	163,500
mazoo	169,712	189,200	207,100	216,000	234,400
aska	4,382	4,100	3,700	3,700	3,700
t	363,187	392,700	416,900	440,500	470,500
eenaw	2,417	2,200	1,800	1,700	1,700
e	5,338	5,200	4,900	4,900	5,000
eer	41,926	43,700	44,700	46,400	48,700
anau	9,321	9,300	9,100	9,200	9,500
Lenawee	77,789	82,200	85,300	89,100	94,000
Livingston	38,233	44,100	50,000	54,600	60,200
Luce	7,827	7,400	6,800	6,800	6,800
Mackinac	10,853	11,300	11,600	12,000	12,600
Macomb	405,804	532,100	669,300	829,800	1,003,900
Manistee	19,042	18,600	17,800	17,900	18,300
Marquette	56,154	58,700	60,300	62,700	65,800
Mason	21,929	21,800	21,300	21,600	22,200
Mecosta	21,051	21,400	21,200	21,700	22,400
Menominee	24,685	23,600	22,000	21,800	22,000
Midland	51,450	59,500	67,700	74,100	82,000
Missaukee	6,784	6,100	5,600	5,600	5,400
Monroe	101,120	112,500	123,100	132,100	143,300
Montcalm	35,795	37,100	37,700	39,100	40,700
Montmorency	4,424	4,400	4,400	4,500	4,600
Muskegon	149,943	160,400	168,700	177,300	188,400
Newaygo	24,160	24,700	24,600	25,300	26,200
Oakland	690,259	808,208	905,500	1,014,100	1,132,000
Oceana	16,547	16,200	15,500	15,600	15,800
Ogemaw	9,680	9,600	9,200	9,200	9,400
Ontonagon	10,584	10,300	9,900	9,900	10,100
Osceola	13,595	13,000	12,300	12,200	12,200
Oscoda	3,447	3,500	3,500	3,500	3,700
Otsego	7,545	7,900	8,100	8,400	8,800
Ottawa	98,719	110,000	120,500	129,200	140,300
Presque Isle	13,117	13,200	13,200	13,500	13,900
Roscommon	7,200	7,700	8,000	8,400	8,900
Saginaw	190,752	204,800	216,000	228,500	244,400
St. Clair	107,201	111,600	114,200	118,500	124,300
St. Joseph	42,332	44,900	46,600	48,700	51,500
Sanilac	32,314	31,800	30,900	31,100	31,800
Schoolcraft	8,953	8,600	8,000	8,100	8,000
Shiawassee	53,446	55,400	56,700	58,600	61,400
Tuscola	43,305	44,500	44,700	46,000	47,900
Van Buren	48,395	51,900	54,500	57,300	60,900
Washtenaw	172,440	196,200	227,600	261,400	292,200
Wayne	2,666,297	2,716,600	2,755,800	2,819,800	2,908,800
Wexford	18,466	17,700	16,600	16,600	16,700
MICHIGAN	7,823,194	8,387,000	8,891,000	9,494,000	10,204,000

In part, Professor Thaden writes in the *Report*: "As a result of the low birth rate of the depression in the 1930's, the 20-to-29-year-old group actually declined in number between 1950 and 1960, a decrease of over 10 percent. On the other hand, the baby boom of the postwar years has increased the number of young folks. Between 1950 and 1960, persons under 20 years of age increased nearly a million, or 45 percent.

"The population in the economically most productive years, 20 to 64, increased between 3.7 and 4.0 million between 1950 and 1960, or less than 8 percent. Increasing longevity has boosted the number of persons 65 years and over from 461,650 to 638,184, an increase of 44 percent in a single decade. These senior citizens comprise a larger portion of the population than they did a decade ago in 60 of the 83 counties. The relatively rapid increase of children and teenagers and people of retirement age has increased the burden on persons of working age.

"Between 1960 and 1980 Michigan's population under 5 years of age will increase by 20 percent; those between 5 and 14 years will increase by 20 percent; those between 15 and 19 years will increase by 58 percent; those between 20 and 29 years will increase by 97 percent; those between 30 and 64 years by 13 percent; and those 65 and over by 38 percent."

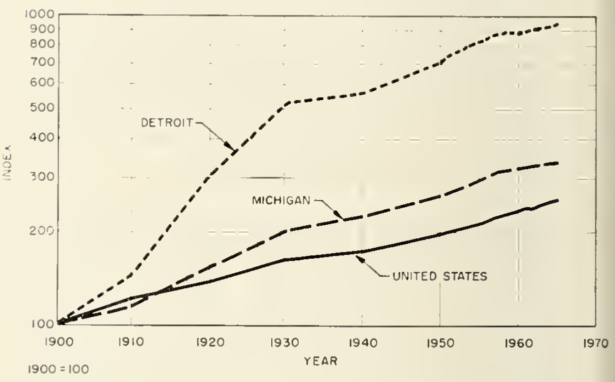
PHYSICIANS IN THE big cities have noted the increasing percentage of women. Yes, men constitute the minority sex in most counties with large cities. Professor Thaden observes:

"Michigan, for the first time in history, now has a larger female than male population. Woman power is supplanting manpower in more ways than one. The ratio of 1,017 males per 1,000 females in 1950 changed to 985 males per 1,000 females by 1960. And the trend is certain to continue. The decline in the ratio of males reflects the decrease in immigration from foreign countries, which was predominantly male, as well as the ever-increasing differential longevity of women, a trend marked by every census."

The shift from farm to city will continue, and in 1980 more than 10 million will live in the city, and about 2½ million will be classified as rural residents. Author Thaden writes:

"For many decades there has been a gradual decrease in the farm population of the state and a gradual increase in both the urban and rural nonfarm population. The Census Bureau counts as urban all incorporated and unincorporated places of 2,500 inhabitants or more and the densely settled urban fringe, whether incorporated or unincorporated. Changes in population reflect the effect of any annexations or detachments.

"The farm population will continue to decrease and the urban and rural nonfarm population will continue to increase. The extent of change in each category can only be conjectured. Most likely, the farm population will decline about 62 percent between 1960 and 1980 and represent only 1.7 percent of the population at that time. Total rural population will increase, however, by about 22 percent."



(FROM U.S. BUREAU OF THE CENSUS)

Population growth in the Detroit area, including Wayne, Oakland, and Macomb Counties, has shown the same relationship to Michigan growth as Michigan did to the nation. In 1900 the Detroit area accounted for 17 percent of the state total. This rose to 48.1 percent in 1960, then declined to 47.8 percent in 1963. In the past two years, the Detroit area experienced an in-migration to recover from an earlier out-migration, so that the ratio now stands at 49.1 percent.

On July 1, 1965, the Detroit area population was estimated at 4,041,000. The Michigan population was estimated at 8,220,000 and the nation at 193,818,000.

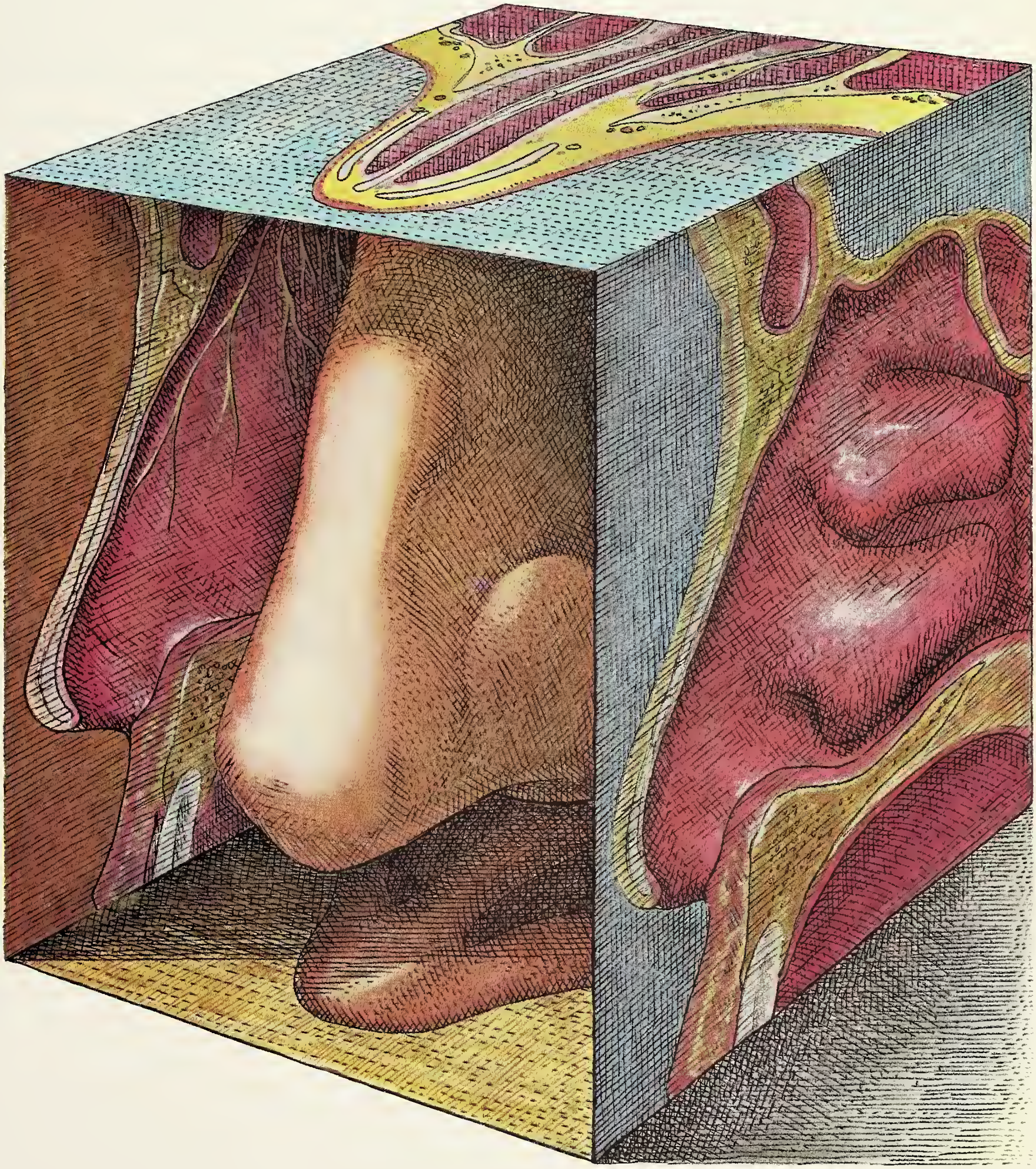
Throughout the first half of the century, Michigan's population has grown at a substantially faster rate than did the nation. In the 60 years to 1960, Michigan grew by 223 percent as against 135 percent for the USA. Since 1960 however, the situation has been reversed. The national growth was 8.1 percent, but Michigan gained only 5.1 percent.

Much additional information may be obtained from the Detroit Metropolitan Area Regional Planning Commission.

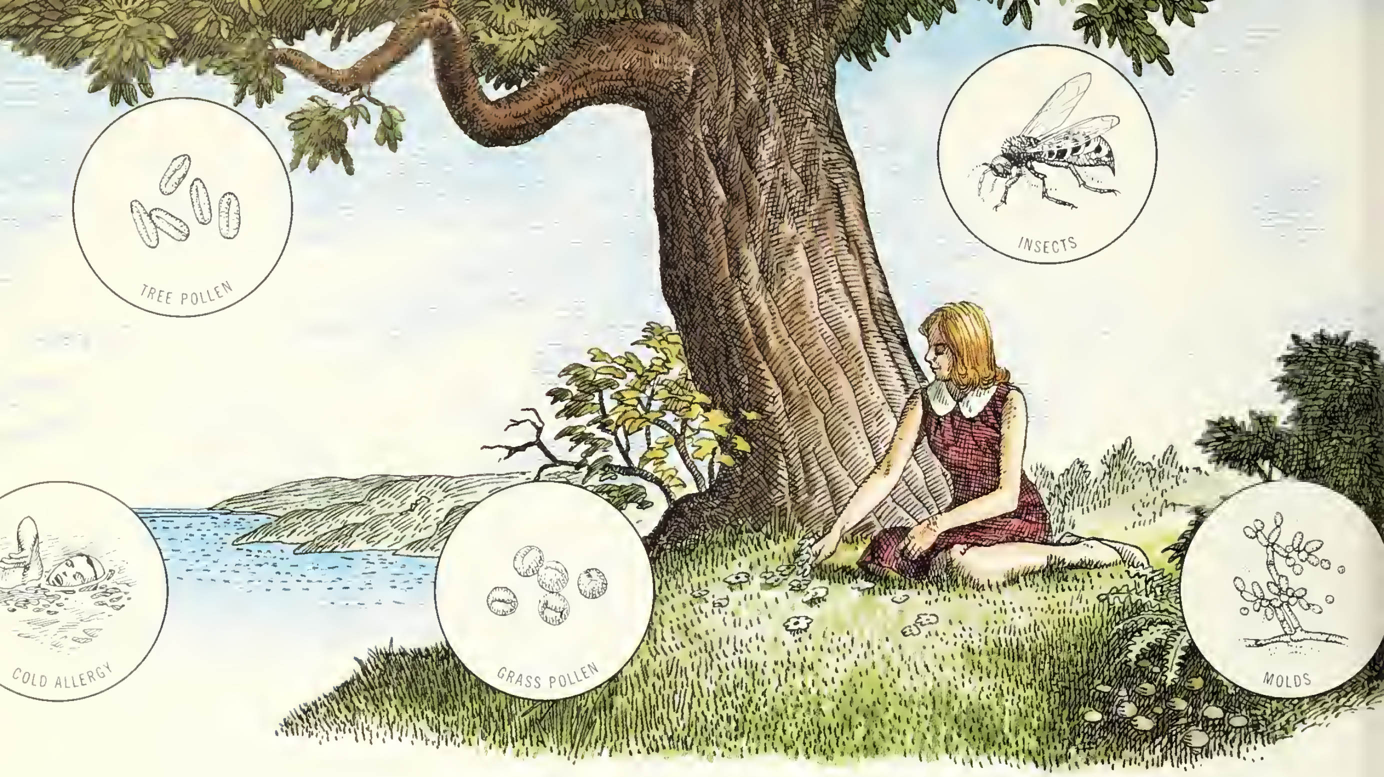
spring 1967

DORSEY Season

A journal within a journal published quarterly in the interests of better medicine by Dorsey Laboratories, a division of The Wander Company, Lincoln, Nebraska. Address communications to Raymond C. Pogge, M. D., Director of Medicine.



this issue: the ubiquitous world of summer allergies



the ubiquitous world of summer allergies

Donald L. Unger, M.D. • Clinical Assistant Professor, Department of Medicine (Allergy), Stritch School of Medicine (Loyola).

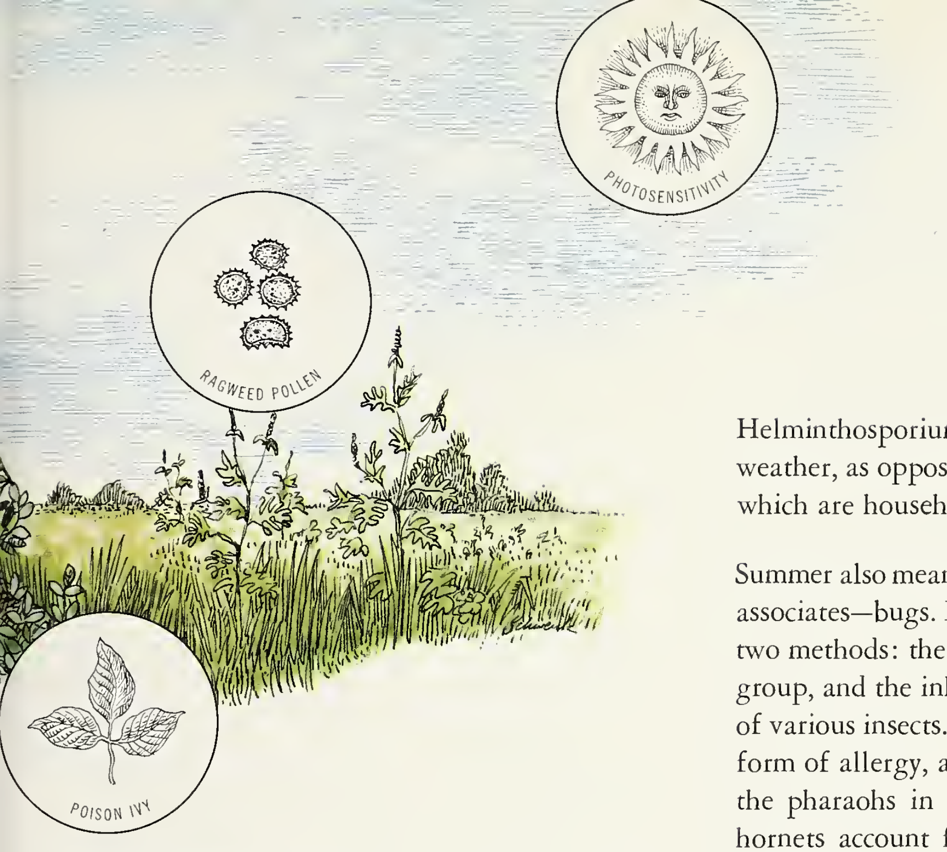
In the Spring a young man's fancy lightly turns to thoughts of—allergies. This is at least true of the 10% of the population who have hay fever and the 4% who have asthma.[1] The snow melts, the trees blossom and the noses run. Patients who were fine all winter may not be enthralled by the sight of the first robin or the blossoming of a crocus, for their appearances may precede the "sneezin' season."

Allergies in general can be divided into winter allergies and summer allergies. In the winter the main problems are inside the house: e.g. dogs, cats, dust and feathers. Houses in the northern half of the country become so dry that it becomes essential to add humidity to the home; this is a far cry from the damp summer months with the moldy basements and need for dehumidifiers.

Early in April trees begin to pollinate, with each tree having about a two week period of pollination. A particular patient may be sensitive to only one tree and thus have his hay fever for such a short time that he thinks he has a cold.[2] The entire tree season starts about April 1 and ends about Memorial Day, although all hay fever seasons are blurred and prolonged in the southern part of the country. Tree pollen is usually very heavy and a person may well have most of his exposure from those trees immediately surrounding his home.

Grasses pollinate from about May 15 until July 4, and cause "rose fever." Grass pollens are somewhat lighter and more buoyant than tree pollens, and are much more ubiquitous. While there are several varieties of grasses in the United States, they are so closely related antigenically that a person sensitive to one is generally sensitive to them all.[3] Thus, while the tree season is really several small seasons intertwined, the grass season will usually result in symptoms for a more prolonged period. Obviously, a grass-sensitive patient will have trouble only when grass is pollinating—he will have to think of another excuse not to mow the lawn after July 4.

Ragweed is the "Big Daddy" of them all in the eastern two-thirds of the country. Pollination is generally from mid-August until the end of September, with the predicted lower counts and longer seasons



in the southern part of the country. Ragweed is a very light pollen which may be windborne for hundreds of miles. An interesting study was made in New York City, in which 90% or more of the ragweed plants were destroyed in three of the five boroughs; pollen counts done during the season were virtually identical in all five.[4]

Ragweed is, of course, the most common cause of hay fever and is associated with an incredible loss of man hours from work each year. Many is the patient who travels to areas where the pollen count is low, just to avoid having symptoms. There is no ragweed anywhere in the world except the United States and portions of Canada and Mexico.

While molds are present through the year, the most important ones predominate from April until November. An old wives' tale has ragweed ending with the first frost, when actually it ends a good month earlier. It is Alternaria—the kingpin of the molds—that meets a sudden demise with the first frost. Alternaria-sensitive patients are in their glory when there is snow on the ground, and might be ideally suited to man the radar stations in Alaska. In September and October, Alternaria counts are at their highest, perhaps associated with the burning of leaves. Other molds such as Hormodendrum and Helminthosporium are associated with the warmer weather, as opposed to Penicillium and Aspergillus which are household molds.

Summer also means the return of our much maligned associates—bugs. Insects cause allergic symptoms by two methods: the bite or sting of the Hymenoptera group, and the inhalation of particles of the bodies of various insects. Wasp stings are the oldest known form of allergy, as they caused the death of one of the pharaohs in ancient Egypt.[5] Bees, wasps and hornets account for many deaths in this country, and those sensitive to them should carry special treatment kits at all times; a few minutes delay in the administration of epinephrine to such a patient, might be the difference between life and death. Inhalation of particles of insects may cause sneezing and wheezing in a susceptible individual.[6] Both of these forms of insect allergy may be benefitted by hyposensitization.

The insect recognizes no professional bounds. He is as apt to bite the physician as the patient. So this season, beware of bugs. And beware, too, of poison ivy. That pleasant stroll through the woods and underbrush with the Boy Scouts might turn into a

(Concluded on following page)

to relieve summer allergies

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nightmare for the botanically uninitiated in the causes of rhus dermatitis (poison ivy, poison oak and poison sumac). Although you may have been careful, your dog may not have noted that it wasn't clover he jumped through, but poison ivy. His return to your side may give you the rhus dermatitis that you so carefully avoided. That heavenly campfire may be emitting particles of rhus oil to produce an airborne contact dermatitis of the exposed areas of the body.

Another fascinating, but rather infrequent type of summer allergy is physical allergy. Some people sneeze on exposure to sunlight, while others break out in rashes, usually on the exposed parts of the body. These rashes may well follow the administration of various photosensitizing drugs, e.g. demethylchlortetracycline.[7] Another form of physical allergy and one that may be lethal in the summer, is cold allergy. Yes, I mean cold allergy, not heat allergy. The cool dip on a hot day with its consequent sudden chilling of the body, may be the coup de grace for a cold sensitive patient.[8] It is customary to write "heart attack" on the death certificate, even though the victim may have been an 18-year-old boy who looks like a Greek god.

Lest the reader be depressed by this saga of afflictions associated with the warmer months, perhaps he should remember that it is also a time for swimming, baseball, lying in the sun and taking that long-planned vacation. So let's all join in a chorus of "In the Good Old Summertime," as we sneeze, wheeze and scratch. Be careful of your suntan lotion, however; it may cause you a contact dermatitis.

References

1. Unger, L.: Bronchial asthma. Charles C. Thomas Co. p. 47, 1946. 2. Samter, M.: Immunological diseases. Little, Brown and Co. p. 513, 1965. 3. Wodehouse, R. P.: Antigenic analysis by gel diffusions: 2. Grass pollen. Int. Arch. Allerg. **6**:65, 1955. 4. Cohart, E. M., and Kandle, R. P.: The Effects of a ragweed control program on ragweed pollen counts, J. Allergy **30**:287, 1959. 5. Woddell, L. S.: Egyptian civilization: Its origin and real chronology and Sumerian origin of Egyptian hieroglyphics. London: Luzak & Co. 1930. 6. Parlato, S. J.: The sandfly (Caddis fly) as an exciting cause of allergic coryza and asthma: II. Its relative frequency. J. Allergy **1**:307, 1930. 7. Ozere, R. L.: Demethylchlortetracycline photosensitivity. Canad. M. A. J. **85**:1199, 1961. 8. Horton, B. T., Braun, G. E., and Roth, G. M.: Hypersensitiveness to colds, JAMA **107**:1263, 1936.

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(Advertisement)

Martin Heads Plans For APA Convention

Detroit will be host this spring for the 123rd Annual Meeting of the American Psychiatric Association, May 8-12.

Nearly all Association functions will be held at Cobo Hall. The APA headquarters hotel will be the Sheraton-Cadillac.

This year's program includes over 200 papers covering a wide variety of topics such as child psychiatry, mental retardation, geriatrics, family and group therapy, sleep and dream research, and psychopharmacology.

Themes of current national interest will supply many other topics. In this category will be papers on psychedelic drugs, society in ferment, addiction and alcoholism, man and the artificial organ, racial problems, computers and psychiatry, and college and mental health.

In addition to the scientific sessions will be special lectures, breakfast seminars, closed-circuit television programs, the annual banquet, and special tours of professional, scientific, and social interest.

Wives accompanying APA members will participate in tours, luncheons, and excursions.

Registration for the entire week's program is $10 per person, $5 for a single day's meeting. Students presenting a letter of identification from the dean of their schools may register for the week's sessions for $1. Residents' and interns' fees are also $1.

Further information regarding the APA meeting may be obtained from Peter A. Martin, M.D., Detroit, chairman of local arrangements.

PUBLISHES HEALTH CAREERS FOLDER

The Recruitment Committee of the Woman's Auxiliary to the Jackson County Medical Society has published an attractive, valuable folder on "Health Careers" for interested young people.

The folder contains "capsule definitions and descriptions of the many medical and medically-related careers available to young people in today's challenging society. . . ." The brochure also lists the names of professionals in Jackson who will help answer questions raised by interested students, counselors and teachers.

A copy may be obtained from Mrs. Edward C. Lake, 786 Bloomfield Boulevard, Jackson.

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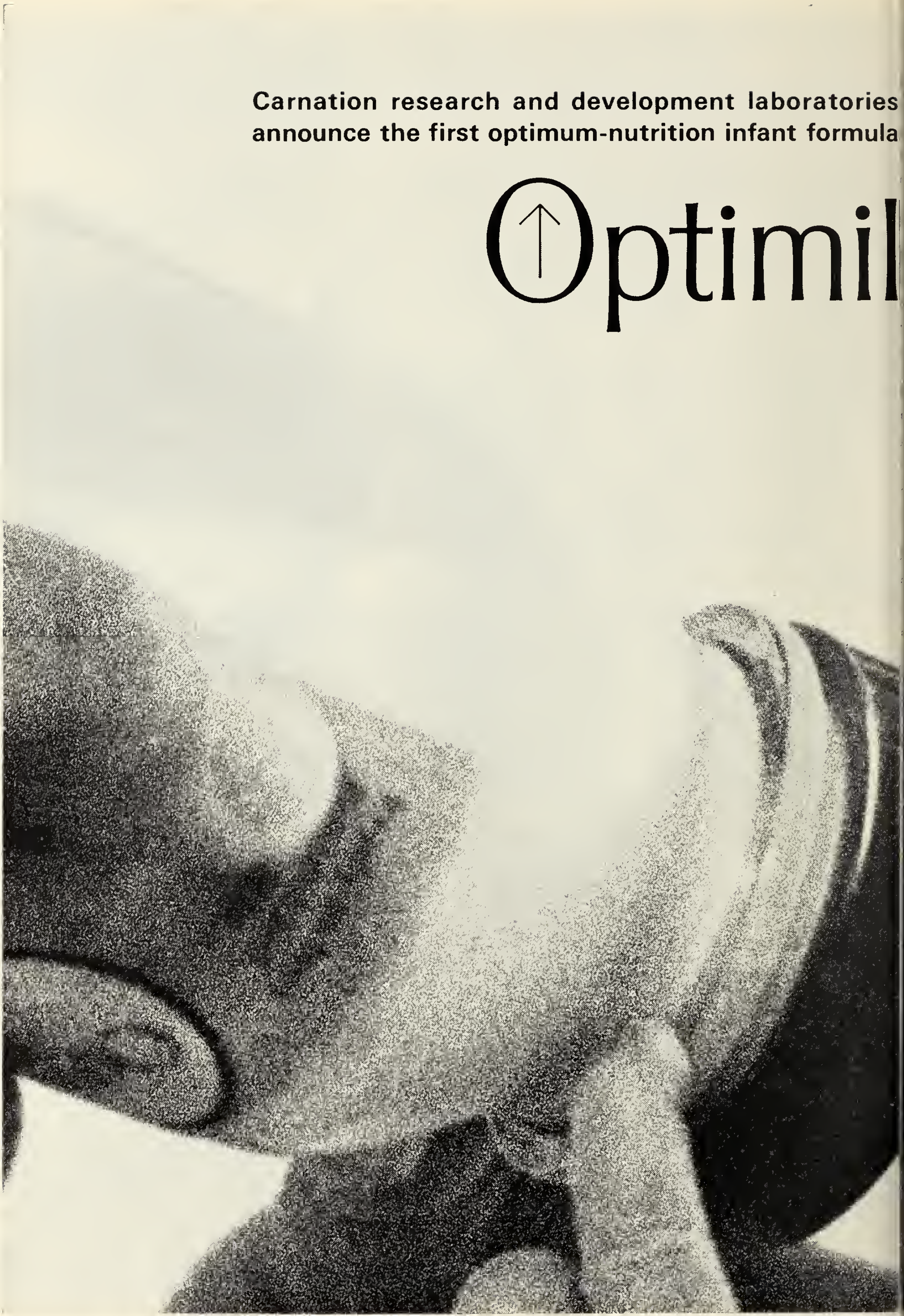

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1. Carson, M., and Hart, L.: "New Perspectives on Nutritional Aspects of Modified Milk-Fat Formulas," Colloquim held under the auspices of The Pediatric Department, Western Reserve University School of Medicine at Cleveland, Ohio, Sept. 8, 1966. Data available on request.

2. Hepner, R.: ibid. 3. Nichols, M.: ibid. 4. McCann, M.L.; Teree, T., and Wallace, W.; ibid.

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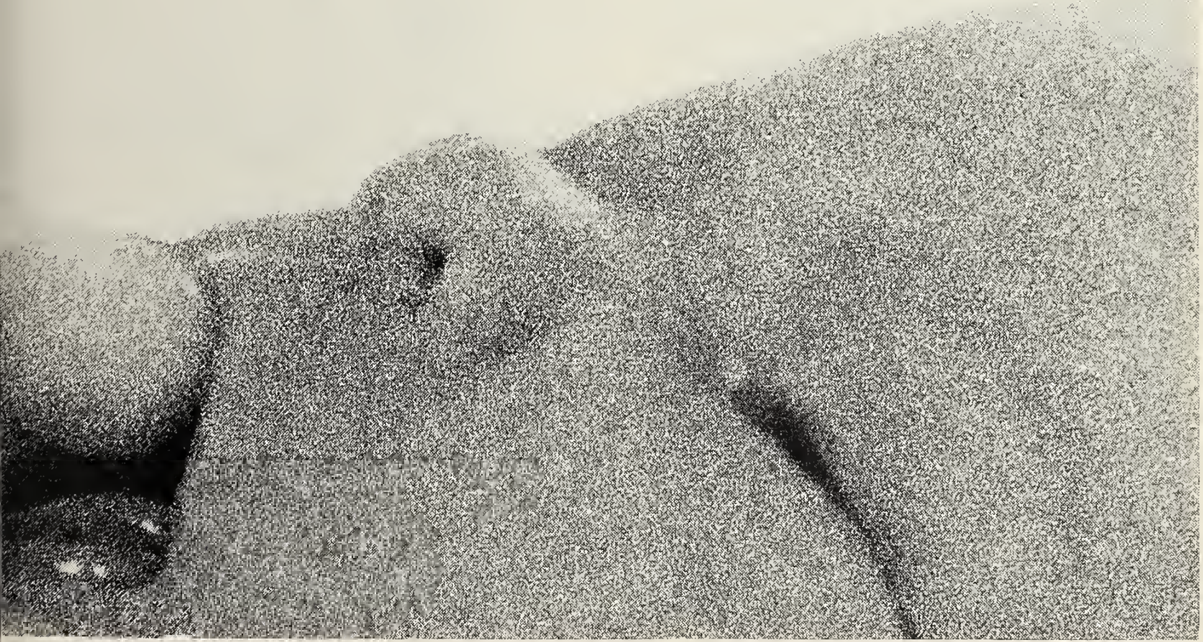


The electrocardiograph, an instrument developed by the late Frank N. Wilson, M.D., University of Michigan Medical School, is displayed now in the new Hall of Medical Sciences at the Museum of History and Technology, a Branch of the Smithsonian Institute in Washington, D.C.

PTA Steps Up Recruiting Efforts in Health Field

The 350,000 members of the Michigan PTA have been challenged "to encourage well-qualified students to prepare for careers in health."

Career recruitment has been selected as a major effort this year by the Michigan PTA Health Chairman, Mrs. Charles R. Palmer.

In a recent message to PTA members she urged health career efforts by contacting local medical societies, medical auxiliaries, and the Michigan Health Council.

Mrs. Palmer has urged PTA program chairmen "to plan a program that will promote careers in health."

The Michigan PTA also has voiced concern for venereal disease education and alcoholism education and also for efforts "to keep seventh and eighth graders from starting to smoke."

Air Pollution Control Regulations Proposed

"We can look forward to a reduction in pollution and cleaner air for Michigan in the not too distant future," declared Albert E. Heustis, M.D., Chairman of the Michigan Air Pollution Control Commission and State Director of Public Health.

Commenting on a unanimous vote of the nine-member Air Pollution Control Commission at their meeting on February 3, Doctor Heustis observed that the new rules drawn up by the Commission "will become effective some time this year following review by the Legislative Service Bureau and the Attorney General."

New air pollution control regulations, which will be available to the public shortly, will give Michigan the first statewide set of air pollution rules.

AUXILIARY CONTINUES TO HELP HEALTHMOBILE: DELEGATES LAUDED SERVICE

Appreciation to the Woman's Auxiliary for its contributions to the success of the Healthmobile was voiced by the 1966 MSMS House of Delegates. And now the Auxiliaries are helping with the remodeled Health Careers Mobile.

The resolution thanked the many health-oriented organizations and several hundreds of people "who contributed time, effort, material, and money toward the maintenance and travel of the unit throughout the state."

The MSMS House of Delegates noted that during 1965-1966 the Healthmobile had appeared in 45 communities "with the local Woman's Auxiliary serving as hostesses."

In part, the Resolution lauded the Healthmobile project and pointed out that the unit had "focused attention on the contributions of Michigan medicine and the concern of Michigan physicians for the good health of Michigan residents."

Resolution No. 20 continued: "Locally, it served as an excellent public educational device for the county medical society and its auxiliary to perform a service for the school children, their parents and other interested adults."

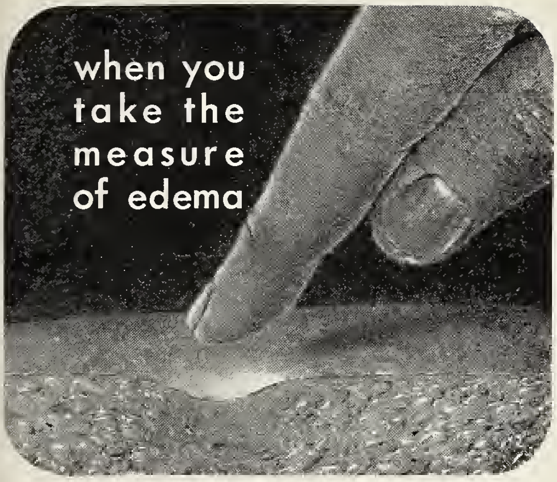
Spoke At AMA Conclave

Two Michigan physicians spoke at the AMA Meeting on Home-Centered Health Care in Chicago. Sidney Chapin, M.D., Dearborn, discussed the Visiting Nurse Association of the Detroit Home Care Program as well as the progress made throughout Michigan during the past five years in establishing coordinated home care programs. Vlado Getting, M.D., Ann Arbor, gave a report on the numerous Home Care Workshops held at the University of Michigan School of Public Health to acquaint physicians, nurses, hospital administrators, and other health professionals on sound methods of developing and implementing home health services in communities.

Doctor Chapin, who has served for several years as Medical Director of the VNA's Home Care Program and as Chairman of the Home Care Committee of the Michigan Health Council, also served as a principal speaker at the Los Angeles Home Care Training Program Conference.

SPONSOR ART EXHIBITION

The Mason County Medical Society is displaying paintings of local artists at the Mason County Medical Care Facility. Co-chairmen for the project are Mrs. William Sutter, Ludington, and Mrs. Robert Garneau, Manistee.



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DIURETIC ACTION: Clinically, the oral administration of AQUATAG (benzthiazide) results in diuretic activity within two hours with maximal natriuretic, chloruretic, and diuretic effects occurring during the fourth, fifth and sixth hours. Maintenance of response continues for approximately 12 to 18 hours. Acidosis is an unlikely complication since therapeutic doses of AQUATAG (benzthiazide) do not appreciably increase bicarbonate excretion. Edematous patients receiving 50 mg. of AQUATAG (benzthiazide) daily for five days developed a maximal increase in the rate of sodium excretion on the first day, and maintained this high rate until depletion of excessive body stores of sodium.

In congestive heart-failure patients, AQUATAG (benzthiazide) produced the same weight loss, during a 48-hour treatment period as did a maximally effective dose of hydrochlorothiazide.

DOSAGE: Diuresis, initially 50 to 200 mg.; maintenance 25 to 150 mg., daily. Hypertension 50 to 100 mg. initially, adjusted to 50 mg. t.i.d. or downward to minimal effective dosage level.

WARNINGS: Use with caution in the presence of renal disease as azotemia may be precipitated or increased. In patients with advanced hepatic disease, electrolyte imbalance may result in hepatic coma. Dosage of coadministered antihypertensive agents should be reduced by at least 50%. In cases of suspected electrolyte imbalance, serum electrolyte determinations should be performed and imbalance, if any, corrected. Stenosis or ulcer of small intestine have been reported with coated potassium formulas, and surgery has been required and deaths have occurred. Based on surveys of both United States and foreign physicians, incidence of these lesions is low and a causal relationship in man has not been definitely established. Until further experience has been obtained, the use of the drug in pregnant patients should be weighed against possible hazards to the fetus.

CONTRAINDICATIONS: AQUATAG (benzthiazide) is contraindicated in progressive renal disease or dysfunction including increasing oliguria and azotemia. Continued administration of this drug is contraindicated in patients who show no response to its diuretic or antihypertensive properties. Severe hepatic disease is a relative contraindication. (See "Warnings" above.)

PRECAUTIONS AND SIDE EFFECTS: Electrolyte imbalance with hypokalemia (digitalis toxicity may be precipitated), hypochloremic alkalosis and hyponatremia may occur.

Patients with cirrhosis should be observed for impending hepatic coma and hypokalemia. Other reactions may include blood dyscrasias, hyperuricemia and gout, nausea, jaundice, anorexia, vomiting, diarrhea, dizziness, paresthesia, photosensitivity and headache. Hepatic fetor, tremor, confusion and drowsiness are signs of impending pre coma and coma in patients with cirrhosis. Insulin requirements may be altered in diabetes. AQUATAG (benzthiazide) should be used with caution post-operatively as hypokalemia is not uncommon. Potassium supplementation may be advisable pre- and post-operatively. There have been occasional reports of thrombocytopenia, leukopenia, agranulocytosis, aplastic anemia and precipitation of acute pancreatitis or jaundice.

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Name Acting Director For Facilities Council

Frank E. Catto has been appointed acting director of the Michigan Health Facilities Planning Council, succeeding Harry J. Parke, who resigned to accept a position with the California Physicians Service in San Francisco.

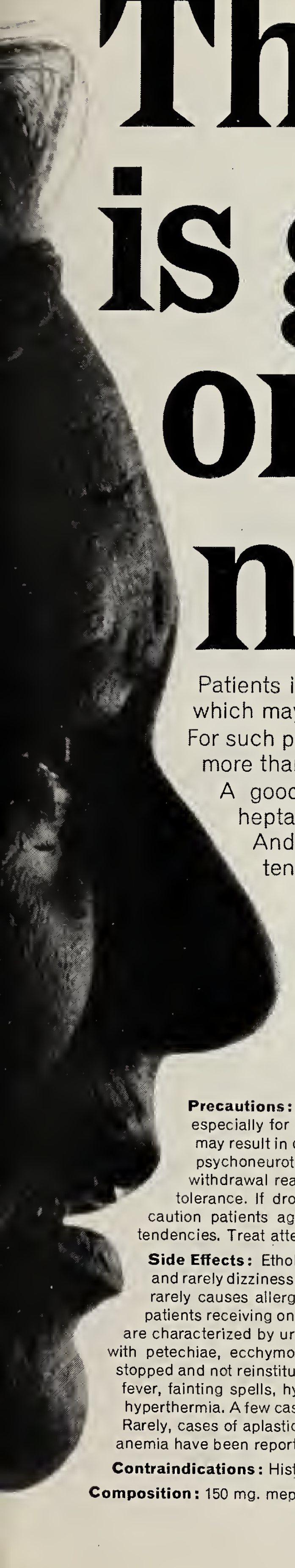
For the past 18 months Mr. Catto has been associate director of the Council and previously had served in a public relations capacity with Portland Cement Association, the Michigan State Medical Society, and the Michigan Health Council.

Michigan Health Facilities Planning Council, a division of the Hospital Research and Educational Reserve of Michigan, Incorporated, seeks as a voluntary organization to eliminate the duplication of health facilities and to provide more efficient utilization of facilities and personnel.

TEST YOUR MEDICAL ETHICS

Question: May I, as a patient's attending physician, discuss the patient's history, diagnosis, treatment, prognosis, etc., with the patient's attorney?

ANSWER: Yes, with the consent of the patient. The Principles of Medical Ethics recognize in Section 10 that the physician has obligations to society as a whole in addition to his obligations to his patient as an individual. In many instances the peculiar knowledge and attainments of the physician are indispensable to patients or others in the administration of business and government and in the usual conduct of certain daily affairs. When this knowledge, acquired during the course of the physician-patient relationship, is necessary to enable the patient to obtain his just due, the physician should make it available for the patient's benefit under proper conditions. Discussion with or report to the patient's attorney may be proper and necessary in order for the patient to perfect a claim. The attending physician may ethically discuss the patient's history, etc., with the attorney, providing, of course, the patient has consented to the discussion.



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Precautions: Keep out of reach of children. Carefully supervise dose and amounts prescribed, especially for patients prone to overdose themselves. Excessive prolonged use of meprobamate may result in dependence or habituation in susceptible persons—as ex-addicts, alcoholics, severe psychoneurotics. Withdraw gradually after prolonged high dosage to avoid possibly severe withdrawal reactions including epileptiform seizures. Warn patients of possible reduced alcohol tolerance. If drowsiness, ataxia or visual disturbances occur, reduce dose. If symptoms persist, caution patients against operating machinery or driving. Give cautiously to patients with suicidal tendencies. Treat attempted suicide with immediate gastric lavage and appropriate supportive therapy.

Side Effects: Ethoheptazine and aspirin may occasionally cause nausea, vomiting, epigastric distress, and rarely dizziness and CNS depression. Overdosage may result in salicylate intoxication. Meprobamate rarely causes allergic or idiosyncratic reactions. These reactions, sometimes severe, can develop in patients receiving only 1 to 4 doses who have had no previous contact with meprobamate. Mild reactions are characterized by urticarial or erythematous maculopapular rash. Acute nonthrombocytopenic purpura with petechiae, ecchymoses, peripheral edema and fever have been reported. Meprobamate should be stopped and not reinstituted. Severe reactions, observed very rarely, include angioedema, bronchial spasms, fever, fainting spells, hypotensive crises (1 fatal case), anaphylaxis, stomatitis and proctitis (1 case) and hyperthermia. A few cases of leukopenia, usually transient, have been reported following prolonged dosage. Rarely, cases of aplastic anemia (1 fatal case), thrombocytopenic purpura, agranulocytosis, and hemolytic anemia have been reported; almost always, in the presence of known toxic agents.

Contraindications: History of sensitivity or severe intolerance to aspirin or meprobamate.

Composition: 150 mg. meprobamate, 75 mg. ethoheptazine citrate and 250 mg. aspirin per tablet.

Wyeth Laboratories Philadelphia, Pa.

(Note: This article was prepared for Michigan Medicine *by the Washington Office of the American Medical Association.)*

HEW Report Offers Recommendations "To Slow Down" Rising Health Care Costs

Washington, D. C.—The Department of Health, Education and Welfare stated in a special report that both hospital charges and physicians' fees increased sharply last year.

A continued increase in health care costs was predicted in the report ordered last August by President Johnson.

Drugs were not a significant factor in the recent accelerated increase in health care prices, the HEW Report said. But it added that "drug prices are higher than they would be if there were more vigorous competition at either the manufacturing or drugstore level."

As for the two major components in the Medical Care Index, the HEW Report said:

—Physicians' fees, which had been rising about 3 percent a year in 1960-65, went up 7.8 percent in 1966 – the biggest annual increase since 1927.

—Hospital daily charges, rising about 6 percent a year between 1960 and 1965, went up 16.5 percent in 1966 – the largest annual increase in 18 years.

The increase in doctor fees was attributed in the HEW Report to a combination of basic factors: "more people are seeking doctors' services more often and the number of active physicians is increasing relatively slowly." The study found no evidence that Medicare, which went into effect last July 1, was a major factor in the rise in doctors' fees.

The increase in hospital charges was attributed largely to rising wages, which account for two-thirds of hospital costs, and increases in the price of things hospitals buy. The wage rise has not been off-set by increased productivity, the report said, and rising standards of care in hospitals have required more expensive equipment and facilities.

Meantime, Robert J. Myers, the Social Security Administration's chief actuary, told the House Ways and Means Committee, that hospital costs had risen much faster than the Administration anticipated since the Medicare plan went into effect. If they continue their upward spiral, the costs will eat away the safety margin included under the Medicare financing plan, Myers said.

The HEW Report held out little hope for an early end to medical price increases. However, it recommended a series of actions "to slow down these increases and to promote the efficient use of medical care resources."

Recommendations in the HEW Report included:

—Comprehensive community health care systems should be developed, demonstrated, and evaluated.

—Group practice, especially prepaid group practice, should be encouraged.

—Private and public health insurance plans should be broadened to include more alternative types of medical care.

—States should move quickly to establish and support strong health planning agencies at the state and local levels.

—Cost-reducing methods of reorganizing the delivery of services in hospitals and other providers of health services should be developed, demonstrated, and implemented.

—Federally supported health care programs should be used to train physician assistants, evaluate their performance, and disseminate the results.

—Federal funds available under the Health Professions Educational Assistance Amendments of 1965 should be used to support and encourage innovations in health professions' education and training which promote the efficient practice of medicine.

—HEW should undertake an intensive examination of frequently prescribed drugs to assess the therapeutic effectiveness of brand name products and their supposed generic equivalents.

—The Food and Drug Administration should provide doctors with authoritative information of the efficacy and side effects of all drugs.

—The HEW should call a national conference of leaders of the medical community and public representatives to discuss ways to improve the quality and efficiency of medical care delivery.

To carry out the recommendations in the HEW Report and allied directives from President Johnson, HEW Secretary John W. Gardner said he would take a number of actions, including establishment of a National Center for Health Services Research and Development and calling of a national conference on medical care costs.

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63% of Drivers In Detroit Fatalities Under Influence

The analysis of the Detroit Police Accident Prevention Bureau report of 1966 traffic deaths showed that 63 percent of the drivers involved in the city's fatal accidents last year were considered to be under the influence of alcohol.

Another category, motorcycle fatalities, rose from six deaths in 1965 to a record 10 deaths in the past year and total motorcycle accidents and injuries also skyrocketed. Four of the fatal victims were under the influence of alcohol.

While all other age groups except one showed a slight increase in their involvement in fatal accidents, the 35 to 44 year bracket nearly doubled its involvement — from 38 drivers in 1965 to 75 in 1966. Encouragingly, the only age group to show improvement last year was the younger set — 15 to 24 years of age — although, with 87 drivers, they were still involved in more fatal accidents than any other age group.

Of the 312 drivers involved in Detroit's fatal accidents, 197 were under the influence of alcohol at the time of the accident, according to a projection of toxicology reports from the Wayne County medical examiner.

The Detroit Police records also showed that 80 percent of the drivers involved in fatal ran-off-the-road freeway accidents last year were drunk. "And in our opinion nearly one-half of all adult fatal victims, including pedestrians and passengers, were medically drunk," declared the medical examiner.

The APB report disclosed that last year there was a nine percent increase in the number of persons apprehended for suspected drunken driving but convictions rose 28 percent. Reckless driving convictions, where drinking was involved, increased 57 percent.

The number of drivers registering a Breathalyzer reading over .15 percent rose from 553 drivers in 1965 to 883 drivers last year, while those registering less than .15 percent dropped from 313 to 111.

Not only did motorcycle fatalities increase but motorcycle injuries also leaped from 430 in 1965 to 650 last year and total motorcycle accidents increased to 815 compared to 558.

Of the 226 fatal accidents in Detroit last year which claimed 239 lives — seven less than 1965 — 63 were ran-off-the-road accidents. This represents a 21 percent reduction from the peak year of 1964 in which 80 such fatal accidents were recorded.

MDPH RECOMMENDS PRECAUTIONS WITH DRY MILK POWDER

BY MICHIGAN DEPARTMENT OF PUBLIC HEALTH

For some time the Department has been concerned about the possibility of the transmission of salmonellosis by means of non-fat dry milk.

The problem is caused by the fact that non-fat dry milk is not necessarily manufactured from pasteurized milk. The manufacture of dry milk uses an air drying process in which the heat required is not sufficient to kill salmonella organisms, and the process is not therefore equivalent to pasteurization.

The problem is not unique to Michigan because it involves interstate commerce. At present, both state and federal food and drug officials are accumulating data which will, it is hoped, define the problem and determine the possible extent of potential contamination of this particular product.

It is well known that very young and debilitated elderly persons are extremely susceptible to salmonellosis and that it poses a much more serious threat to health in these groups than in the general population. As of this date, the Department has epidemiological evidence of five cases of salmonellosis in Michigan which have been traced to the drinking of reconstituted non-fat dry milk. Three of these were infants and the other two were elderly debilitated patients.

As a result, the Michigan Department of Public Health and the Michigan Department of Agriculture have jointly recommended to all hospitals and nursing homes that the following steps be taken whenever dry milk is used:

(1) When used as a beverage or as a supplement to whole milk, it should be heated to equivalent pasteurization temperature— 145 F for 30 minutes or 161 F for 15 seconds.

(2) When used as an ingredient in food, the food should be thoroughly cooked before serving.

(3) Whenever possible, secure non-fat dry milk that has been manufactured from pasteurized milk.

These same precautions should be urged for all infant or elderly debilitated patients of private physicians in Michigan, and they are particularly important whenever such powder may be prescribed as part of an infant formula.

The Department of Agriculture and the Department of Public Health have joined forces to secure an amendment to the pasteurization law which would require that dry milk and non-fat dry milk be manufactured from pasteurized milk.

The Fast, Accurate and Inexpensive method for the following tests — **True Glucose — Hemoglobin Test — Cholesterol Test — Ureanitrogen Test (B.U.N.) — Uric Acid Test.**

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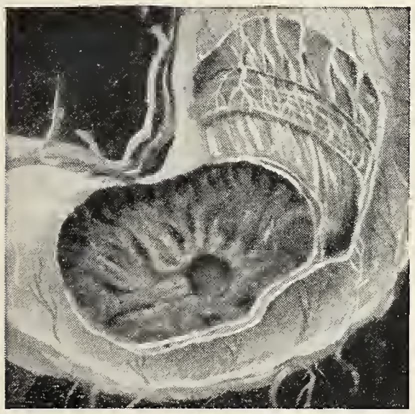
In peptic ulcer... antacid therapy with a new benefit



CONTAINS A BALANCED COMBINATION OF THE MOST WIDELY USED ANTACIDS—FOR RAPID NEUTRALIZATION. PLUS SIMETHICONE—TO CONTROL THE FACTOR WHICH ANTACIDS ALONE CANNOT INFLUENCE.

Mylanta®

- In Mylanta, aluminum and magnesium hydroxides are balanced to minimize the chance of constipation or laxation and still achieve rapid acid neutralization and pain relief.
- The positive action of simethicone helps relieve the painful gas symptoms which often accompany the peptic ulcer syndrome.
- The nonfatiguing flavor and smooth, nongritty consistency of tablets and liquid encourage continued patient cooperation during long-term therapy.

Composition: Each Mylanta chewable tablet or teaspoonful (5 ml.) of liquid contains: magnesium hydroxide, 200 mg.; aluminum hydroxide, dried gel, 200 mg.; simethicone, 20 mg. **Dosage:** one or two tablets, well chewed or allowed to dissolve in the mouth, or one or two teaspoonfuls of liquid to be taken between meals and at bedtime.

The Stuart Company, Pasadena, California
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Stuart

Detroit Roentgen Ray Society to Confer April 17

Speaker at the West Michigan Chapter of the Detroit Roentgen Ray and Radium Society's meeting at Ferguson-Droste-Ferguson Hospital in Grand Rapids on Monday, April 17, will be John H. Ebersole, M.D., Head of Radiation Therapy at the United States Naval Hospital at Bethesda, Maryland.

Doctor Ebersole's talk, which begins at 8:00 PM, is entitled "some Aspects of Lymphoma in the Navy."

U-M Hospital Planners See $75 Million Program

The University of Michigan Hospital administrators, medical staff, and advisers are exploring the hospital's future needs as a statewide patient-referral center and as a teaching hospital for all health professions. A. C. Kerlikowske, M.D., Director, said the expansion, still mostly in the "under-study" state, will take years to accomplish.

Heading the list of needs is a $25 million addition to the general hospital, with 500 beds for acute medical and surgical care, and a mental health unit for the comprehensive care of some 200 adults and adolescents. The planning groups project needs for an ambulatory care unit, costing more than $7 million; an addition to the Outpatient Clinic, costing $6 million; a $5.5 million clinical care and teaching facility; and mental health facilities costing about $14 million. A number of other renovations and installations bring the total to $75,310,000, not including the Children's Hospital now under construction.

HONOR TEAM DOCTORS

The Eaton County Medical Society recently gave special citation awards to Herman F. Van Ark, M.D., and Dan Carothers, M.D., for "Outstanding Service to Organized Athletics" during the year 1966. Both doctors supervised thorough physical examination programs for high school athletes and provided medical coverage during football games in their own communities.

These awards are available from the MSMS Committee on the Medical Aspects of Organized Athletics, 120 West Saginaw, East Lansing, 48823.

CHEST PHYSICIANS ELECT

The Michigan Chapter of the American College of Chest Physicians recently elected George L. Waldbott, M.D., Clinical Instructor at Wayne State University School of Medicine, president.

Clair E. Bassinger, M.D., Grand Rapids, was elected vice-president, and D. Bonta Hiscoe, M.D., Lansing, secretary.

MAKE RACIAL SURVEY IN SCHOOLS

Compilation of statistics from a statewide classroom-by-classroom racial census of Michigan public schools will be completed in May.

"The State Board of Education survey will show the racial composition of student bodies and personnel in all public schools to serve as a baseline against which future progress can be measured and assist in developing efforts to eliminate de facto segregation," officials explain.

The census also is part of a nationwide fact-finding effort of the United States Office of Education.

NUMBER OF DOCTORS DEGREES EARNED IN MEDICINE AS A PERCENTAGE OF ALL EARNED DOCTORATES, AND AS A PERCENTAGE OF PERSONS 28 YEARS OLD ON JULY 1 OF ACADEMIC YEARS ENDING IN 1901, 1951, AND 1962

	ACADEMIC YEAR 1900-1901			ACADEMIC YEAR 1950-1951			ACADEMIC YEAR 1961-1962		
Number of all Earned Doctorates	8,913			18,641			23,593		
	Number	% of Total	% of Persons 28 Years Old	Number	% of Total	% of Persons 28 Years Old	Number	% of Total	% of Persons 28 Years Old
Medicine	8,563	96.07	0.66	11,348	60.88	0.46	12,120	51.37	0.57
Dentistry	2,304	25.85	0.18	2,830	15.18	0.11	3,209	13.60	0.15
Medicine (M.D.)	5,444	61.08	0.42	6,135	32.91	0.25	7,183	30.45	0.34
Optometry	50	0.56	0.004	873	4.68	0.04	217	0.92	0.01
Osteopathy	664	7.45	0.05	427	2.29	0.02	363	1.54	0.02
Veterinary Medicine	100	1.12	0.01	881	4.73	0.04	903	3.83	0.04

(From Page 463, *Journal of Medical Education,* Volume 40, 1065; "Earned Degrees in the Fields of Medicine, 1901-62" by Leonard Karel, Ph.D., National Library of Medicine, Bethesda)

EXCERPTS OF REGULATIONS FOR DOCTOR DRAFT:

In an effort to provide up-to-date information on the involuntary induction of medical doctors and osteopaths, the following material is excerpted from Section 1631.4 of the Selective Service Regulations. Further information is available at any Local Board of the Selective Service System:

Secretary of Defense may also from time to time place with the Director of Selective Service a call or requisition for a specified number of men in any medical, dental, or allied specialist category required for induction into the armed forces.

Concerning the age requirements and/or limitation, the Universal Military Training and Service Act, as Amended, and current Selective Service Regulations require every male citizen and every male alien entering this country for permanent residence to register with the Selective Service System within 5 days of the 18th anniversary of the date of his birth if he is a citizen and if he is an alien, he must register within 6 months after entering the United States.

At the present time, individuals in the age group 18½ to 26 are the only individuals currently being ordered for induction, provided they are, of course, physically, mentally and morally acceptable to the armed forces. However, the law provides that when an individual is deferred for such purposes as completing his education, his liability for military service is automatically extended to age 35. As most doctors do not complete their medical schooling and internship before age 26, they are, none the less, vulnerable for induction on Special Calls by the Department of Defense until age 35. In filling these calls, individuals are selected in order of their dates of birth — if under 26, the oldest individuals are selected first, and if over 26, the youngest individuals are selected first.

Concerning the involuntary induction of osteopaths, current Selective Service Regulations do not specifically refer to these health specialists. However, in mid 1966, the Department of Defense determined and announced that osteopaths would be acceptable to the armed forces and would be eligible for commissioning as medical officers in the same manner or manners which previously applied to medical doctors. Therefore, it is assumed that the current Selective Service Regulations and provisions of the Universal Training and Service Act, as Amended, which apply to medical doctors also are applicable to osteopaths insofar as Selective Service processing is concerned.

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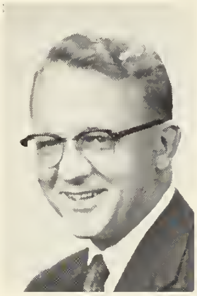
Special U-M Symposium Offered on Auto Injury

All interested Michigan physicians are invited by Conference Chairman Melvin L. Selzer, M.D., on behalf of the Highway Safety Research Institute and the University of Michigan Medical School to attend a Sesquicentennial Symposium on "The Prevention of Highway Injury," April 19-21, in Ann Arbor.

Two of the outstanding speakers at the symposium will be Jack Wickstrom, M.D., Professor and Chairman, Division of Orthopedics, Tulane University School of Medicine, who will speak on "Cervical Sprain Syndrome," April 21, at 11:00 AM, and Julian Waller, M.D., from the California State Department of Health, who will speak on "Drinking Drivers and Driving Drinkers — The Need for Multiple Approaches to Accidents Involving Alcohol," April 19, at 9:30 AM, and "The Contribution of Medical Illnesses to Traffic Accidents," April 20, 3:45 AM.

Dr. Waller


Dr. Wickstrom

Interested persons may register for the Symposium by contacting the Conference Department, Extension Service, University of Michigan, 412 Maynard Street, Ann Arbor, Michigan 48104.

LEGISLATIVE COMMITTEE STUDIES NURSING HOMES

The Speaker of the Michigan House of Representatives has appointed a five-member, bi-partisan ad hoc committee to delve into the problems Michigan's nursing homes may encounter as a result of the "Medicare" program.

Republican Representative Robert Waldron, House Speaker from Grosse Pointe, has named James S. Farnsworth, Plainwell Republican, as chairman of the group.

The Michigan State Medical Society has already noted with concern the short supply of quality nursing home beds in Michigan, pointing out that this condition results in the preempting of many sorely needed acute hospital beds.

MSMS has consulted with the Department of Public Health in the development of certification standards for nursing homes.

WCMS TO INSTALL BICKNELL ON MAY 1

At a dinner meeting May 1, Brock E. Brush, M.D., will pass the gavel and the shield of the Wayne County Medical Society to Frank Bicknell, M.D., the new president for 1967-1968.

All past presidents of the Wayne County Medical Society have been invited as special guests.

To Utilize Films, TV At AMA Convention

Medical motion pictures and color television will again help provide new information for Michigan doctors at the Annual Convention of the American Medical Association in Atlantic City, June 18-22. The Scientific Program will be at Convention Hall and nearby hotels and the House of Delegates at the Chalfonte-Haddon Hall Hotel.

Medical motion pictures have become an integral part of the Annual Convention program. Movies are carefully screened and selected for quality, content, and diversity of subject matter. Some are chosen from the AMA's library of medical motion pictures while others are films just completed.

The entire Scientific Program for the 1967 Annual Convention will be published in the May 8 issue of the *Journal of the American Medical Association.*

Guest speaker at the MSMS Woman's Auxiliary winter meeting at the Whittier Hotel in Detroit was Mrs. Ethel Gastineau, left, member of the Board of Directors of AMPAC. From left to right are Mrs. Gastineau, Mrs. Henry Scovill, President of Woman's Auxiliary to MSMS, and Mrs. Wm. G. Gamble, President-Elect. Mrs. Gastineau urged that the doctor and his wife become more involved in political action because of its importance for medicine.

A Building Block approach to treating hypertension

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With these three therapeutic building blocks you can create a once-a-day regimen to fit almost any degree of hypertension. See the following pages for details . . .

Pargyline Hydrochloride
200
180
160
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120
100
80
Deserpidine
Methyclothiazide

Consider starting your hypertensives on this basic thiazide

ABBOTT

Enduron eliminates sodium around the clock, yet is relatively sparing of potassium

Enduron is a true 24-hour single-dose thiazide. Its sodium excretion is not squeezed into an abrupt peak during the first several hours. It is well-sustained in a plateau-like effect — with little reduction in intensity during the first 12 hours, and decline thereafter only gradual.

Potassium loss, in contrast, reaches an early minor peak. Then it subsides rapidly. Moreover, doses larger than 5 mg. have little added effect on potassium. Thus doubling the dose from 5 to 10 mg. approximately doubles sodium excretion—yet increases potassium loss little or none.

Use Enduron once a day as an ideal starting therapy in mild hypertension. Use it, too, as a basic therapeutic building block with which other agents can be joined, for managing your more resistant hypertensives.

Once a day, every day

ENDURON®
METHYCLOTHIAZIDE

ENDURON
ENDURON
Methyclothiazide

DAILY DOSAGE RANGE	Minimum	Usual	Intermediate	Maximum
	2.5 mg. tablet	5 mg. tablet	7.5 mg.	10 mg.

See Brief Summary on final page of advertisement.

To build added response, shift to Enduronyl

ABBOTT

The deserpidine component compares favorably to reserpine, but with reduced side effects

The rauwolfia component of Enduronyl is deserpidine (Harmonyl®), a purified crystalline alkaloid. It is comparable to reserpine in its antihypertensive and tranquilizing activity. Yet it produces less tendency toward typical rauwolfia side effects such as drowsiness, lethargy, stuffy nose, depression, etc.

Patient acceptance has been excellent.

Enduronyl comes in two strengths: regular and Forte. Both provide 5 mg. of Enduron. The variation is where most needed: in the deserpidine. These scored tablets give a surprisingly flexible choice of doses (see below).

Use Enduronyl for your patients within the broad range of mild to moderate hypertension. Dosage is *once* a day: this means Enduronyl will generally cost patients less than equivalent drugs taken two or three times daily.

ENDURONYL FORTE
Deserpidine
Methyclothiazide

Once a day, every day

ENDURONYL®

METHYCLOTHIAZIDE 5 MG. WITH DESERPIDINE 0.25 MG.

ENDURONYL FORTE

METHYCLOTHIAZIDE 5 MG. WITH DESERPIDINE 0.5 MG.

	Minimum	Usual	Intermediate	Maximum
DAILY DOSAGE RANGE	 2.5 mg. methyclothiazide 0.125 mg. deserpidine	 5 mg. methyclothiazide 0.25 mg. deserpidine	 7.5 mg. methyclothiazide 0.375 mg. deserpidine	 10 mg. methyclothiazide 0.5 mg. deserpidine
DAILY DOSAGE RANGE	 2.5 mg. methyclothiazide 0.25 mg. deserpidine	 5 mg. methyclothiazide 0.5 mg. deserpidine	 7.5 mg. methyclothiazide 0.75 mg. deserpidine	 10 mg. methyclothiazide 1 mg. deserpidine

See Brief Summary on final page of advertisement.

704075

Eutonyl affords a different kind of basic therapy for moderate to severe cases

Effect tied to reduced peripheral vascular resistance; no central depressant action

Eutonyl is a unique nonhydrazine agent. It is reported to act by reducing peripheral vascular resistance, with little or no effect upon cardiac output.[1,2]

In clinical trials, significant reductions in mean blood pressure were seen in 84% of patients studied — including some unusually difficult cases. Eutonyl lowers diastolic in proportion to systolic, and in half of the cases studied, reductions in the sitting and recumbent positions were nearly as great as in the standing position.

Most important: There is no central depressant action. In fact, many patients reported an *increased* sense of well being.

Here, then, is a highly effective *basic treatment* for moderate to severe cases—and one that will not hamper your patient with lethargy or drowsiness while on treatment.

EUTONYL®
EUTONYL®
25
EUTONYL®
50
Pargyline Hydrochloride

Once a day, every day

EUTONYL®
PARGYLINE HYDROCHLORIDE

DAILY DOSAGE RANGE	Minimum	Usual starting	Intermediate	Maximum
	 10 mg. tablet	 25 mg. tablet	 50 mg. tablet or as needed	 200 mg.

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[1] Brest, A. N., et al., Cardiac and Renal Hemodynamic Response to Pargyline, Ann. N. Y. Acad. Sci., 107-1016, 1963.
[2] Winsor, T. Pargyline Hydrochloride, Hypertension, Urinary Tryptamine, and Vascular Reflexes, Geriatrics, 19:598, Aug., 1964.

See Brief Summary on final page of advertisement.

Eutron adds thiazide for enhanced therapy with milder side effects

ABBOTT

Only a 7/4 mm. span between standing and recumbent pressures—reduced chance of orthastatic hypotension

The combining of Eutonyl and Enduron in Eutron permits a significantly greater antihypertensive effect than with either agent used alone. This in turn may allow therapeutic success with lesser dosage—and correspondingly milder side effects.

Indeed, fully 94.5% of all patients studied during clinical trials continued on therapy uninterrupted by side effects.

Most striking was the drug's action in lowering blood pressure to *nearly equal levels in all body positions*. Total average spread between standing and recumbent readings (after treatment) was only 7/4 mm. Hg.

Thus, in your moderate to severe cases, Eutron affords a usually smooth course of therapy, with reduced likelihood of orthostatic effects. And, because of the thiazide component, Eutron may be used in the presence of congestive heart failure.

EUTRON
Methyclothiazide
Pargyline Hydrochloride

Once a day, every day

EUTRON™

PARGYLINE HYDROCHLORIDE 25 MG.
WITH METHYCLOTHIAZIDE 5 MG.

	Minimum	Usual starting	Intermediate	Maximum
DAILY DOSAGE RANGE				
	12.5 mg. pargyline hydrochloride and 2.5 mg. methyclothiazide	25 mg. pargyline hydrochloride and 5 mg. methyclothiazide	37.5 mg. pargyline hydrochloride and 7.5 mg. methyclothiazide	50 mg. pargyline hydrochloride and 10 mg. methyclothiazide

See Brief Summary on final page of advertisement.

TM—Trademark

704075

ENDURON®
METHYCLOTHIAZIDE

ENDURONYL®
Each tablet contains Methyclothiazide 5 mg.
with Deserpidine 0.25 mg. or 0.5 mg.

Indications: Enduron is used to control edema and mild hypertension. Also used with other drugs for hypertension. Enduronyl is used in mild to moderately severe hypertension.

Contraindications: Neither Enduron nor Enduronyl should be used in severe renal disease (except nephrosis) or shutdown; in severe hepatic disease or impending hepatic coma; in patients sensitive to thiazides. Enduronyl is contraindicated in severe mental depression, active peptic ulcer, and ulcerative colitis.

Warnings: Consider possible sensitivity reactions in patients with a history of allergy or asthma. Avoid use of enteric-coated potassium tablets, as these may induce serious or fatal small bowel lesions; if added potassium intake is desired, dietary supplementation is recommended. Coated potassium tablets should be reserved for cautious use when adequate dietary supplementation is impractical.

Precautions and Adverse Reactions: Use thiazides with caution in severe renal dysfunction. Caution is also necessary with impaired hepatic function or progressive liver disease. During intensive or prolonged thiazide therapy, watch chloride and potassium levels (especially the latter if patient is on digitalis). In surgical patients, thiazides may alter response to vasopressors and tubocurarine. Use thiazides with caution in pregnancy (bone marrow depression, thrombocytopenia, or altered carbohydrate metabolism are possible in certain newborn). Occasional thiazide side effects also include blood dyscrasias; elevations of BUN, serum uric acid, or blood sugar; electrolyte imbalance, g.i. disturbances, headache, dizziness, paresthesia, weakness, skin rash, photosensitivity, jaundice, pancreatitis, and gout.

Use Enduronyl with caution in patients with a history of peptic ulcer, as rauwolfias may increase gastric secretion. Discontinue at the first sign of mental depression. Rauwolfias may increase hypotensive effects of surgery or anesthesia, and are best discontinued two weeks prior. They also lower the convulsive threshold in epilepsy. Other possible rauwolfia side effects include drowsiness, nasal stuffiness, nausea, weight gain, and diarrhea. Less frequent complications of deserpidine therapy are aggravation of peptic ulcer, epistaxis, and skin eruption. Alcohol, barbiturates or narcotics may potentiate action of deserpidine.

EUTONYL®
PARGYLINE HYDROCHLORIDE

EUTRON™
Each tablet contains Pargyline Hydrochloride 25 mg.
with Methyclothiazide 5 mg.

Indications: For treatment of patients with moderate to severe hypertension, especially those with severe diastolic hypertension. Not recommended for use in patients with mild or labile hypertension amenable to therapy with sedatives and/or thiazide diuretics alone.

Contraindications: Pheochromocytoma, advanced renal disease, paranoid schizophrenia and hyperthyroidism. Until further experience is gained, not recommended for use in patients with malignant hypertension, children under 12, or pregnant patients.

Concomitant use of the following is contraindicated: other monoamine oxidase inhibitors; parenteral forms of reserpine or guanethidine; sympathomimetic drugs; foods high in tyramine such as cheese; imipramine and amitriptyline, or similar antidepressants; methyldopa. Interval of two weeks should separate therapy and use of these agents.

Warnings: Pargyline hydrochloride is a monoamine oxidase inhibitor. Warn patients against eating cheese, and using alcohol, proprietary drugs or other medication without the knowledge of the physician. When necessary to administer alcohol, narcotics (meperidine should be avoided), antihistamines, anesthetics, barbiturates, chloral hydrate and other hypnotics, sedatives, tranquilizers, or caffeine, these can be used cautiously at a dosage of ¼ to 1/5 the usual amount. Adjust dose of anesthetic agents to response of patient. Avoid parenteral administration where possible. Withdraw pargyline two weeks before elective surgery.

Warn patients about the possibility of postural hypotension. Those with angina or other evidence of coronary disease should not increase physical activity. Pargyline may lower blood sugar. Avoid use of enteric-coated potassium tablets, as these may induce serious or fatal small-bowel lesions; if added potassium intake is desired, dietary supplementation is recommended. Coated potassium tablets should be reserved for cautious use when adequate dietary supplementation is impractical.

Precautions: Measure blood pressure while patient is standing to determine antihypertensive effect. Use with caution in hyperactive or hyperexcitable persons. Such persons may show increased restlessness and agitation. Withdraw drug during acute febrile illness. Watch patients with impaired renal function for increasing drug effects or elevation of BUN and other evidence of progressive renal failure; withdraw drug if such alterations persist and progress. Use with caution in patients with liver dysfunction or progressive liver disease. As with all new drugs, complete blood counts, urinalyses, and liver function tests should be performed periodically. With prolonged therapy, examine patients for change in color perception, visual fields, and fundi.

During intensive or prolonged methyclothiazide therapy, watch chloride and potassium levels (especially latter if patient is on digitalis). Methyclothiazide also may reduce arterial response to pressor amines. Use thiazides with caution in pregnancy (bone marrow depression, thrombocytopenia, or altered carbohydrate metabolism are possible in certain newborns). Thiazide drugs may increase responsiveness to tubocurarine.

Side Effects: Pargyline may be associated with orthostatic hypotension. Mild constipation, slight edema, dry mouth, sweating, increased appetite, arthralgia, nausea and vomiting, headache, insomnia, difficulty in micturition, nightmares, impotence, delayed ejaculation, rash, and purpura have been encountered with pargyline. Hyperexcitability, increased neuromuscular activity (muscle twitching) and other extra-pyramidal symptoms have been reported. Drug fever is extremely rare. Congestive heart failure has been reported in a few patients with reduced cardiac reserve.

Thiazide side effects also include blood dyscrasias, elevation of BUN, serum uric acid, or blood sugar, electrolyte imbalance, g.i. disturbances, headache, dizziness, paresthesia, weakness, skin rash, photosensitivity, jaundice, pancreatitis, and gout. Nocturia has been observed with the combination.

704075

ABBOTT

in memoriam

ANIEL DE VRIES, M.D.

Daniel DeVries, M.D., Grand Rapids, died arch 2. Doctor DeVries was 63.

He was educated at Calvin College and Rush edical College in Chicago, where he received is M.D. degree. After interning at Harper Hos- ital, he served a residency at Cook County Hos- ital, Chicago. Later, Doctor DeVries did post- raduate work at the University of Michigan and arvard University.

Doctor DeVries was a veteran of World War II.

He was secretary of the Board of Trustees of alvin College and was affiliated with Blodgett, utterworth, and St. Mary's Hospitals.

Doctor DeVries was a member of the Alpha appa Kappa medical fraternity.

OHN L. HACKERT, M.D.

John L. Hackert, M.D., Allen Park, died Jan- ary 28 in Outer Drive Hospital. He was 40.

Born in Brooklyn, New York, Doctor Hackert erved two years in the Navy Medical Corps fol- owing graduation from an Elmhurst, Illinois, high hool. A specialist in internal medicine, Doctor ackert received his medical degree from Loyola niversity School of Medicine.

Affiliated with Lynn Clinic and Hospital and akwood Hospital, Doctor Hackert was a former ief of the Department of Medicine at Outer rive Hospital.

YDNEY S. LEVINE, M.D.

Sydney S. Levine, M.D., Detroit, died February 3 at the age of 57.

A native of Brooklyn, New York, Doctor Le- ine was a graduate of the University of Illinois edical School. He was senior staff surgeon at oth Sinai and Hutzel Hospitals and was af- liated with Woman's and Mt. Carmel Hospitals.

Doctor Levine was a member of the American ollege of Surgeons and had served as president f the Detroit Academy for Surgery of Trauma. is medical fraternity was Phi Delta Epsilon.

F. R. MENAGH, M.D.

Frank Robert Menagh, M.D., Detroit, died February 12 in Ford Hospital. He was 76.

He was a past president of the Detroit Dermatological Society and a member of Phi Chi medical fraternity. Doctor Menagh was a life member of the Michigan State Medical Society.

After graduation from Johns Hopkins University Medical School, Doctor Menagh came to Detroit where he practiced dermatology until his retirement in 1963. Until that time he was chief of dermatology at Ford Hospital.

During World War I Doctor Menagh served in the medical corps.

ARCHIE R. O'CONNOR, M.D.

Archie R. O'Connor, M.D., Clinton, died February 18. He was 45.

He was graduated from the University of North Dakota at Grand Forks, and Northwestern University, where he earned his medical degree. His internship was at St. Joseph Mercy Hospital.

Doctor O'Connor was a member of Rotary International, the American Legion, and Phi Beta Pi and Sigma Xi medical fraternities.

He was affiliated with Herrick Memorial Hospital, Tecumseh, and Emmanuel Bixby Memorial Hospital, Adrian.

A. W. SANDERS, M.D.

Alexander W. Sanders, M.D., Detroit, died February 11 at the age of 69.

A fellow of the American College of Surgeons, Doctor Sanders was a board member of the United Hebrew Schools and the Jewish Historical Society and was a founding member of Midrasha.

Born in Russia, Doctor Sanders lived in the Detroit area for 52 years, 40 of which he practiced medicine, specializing in surgery. He was graduated from the University of Michigan Medical School in 1925.

C. D. SELBY, M.D.

Clarence Davey Selby, M.D., Port Huron, died February 26 at the age of 88.

Doctor Selby received his medical education at Western Reserve University, where he was graduated in 1902. For 19 years he was medical director for the General Motors Corporation, where he helped establish General Motor's Industrial Medicine Department.

In 1941 he was given the William S. Knudsen Award for his contributions to industrial medicine.

A Fellow of the American College of Surgeons, a member of the Public Health Association, Association of Industrial Physicians and Surgeons, and the Industrial Hygiene Association, Doctor Selby had served as secretary-treasurer of the St. Clair Medical Society. In addition, he was a member of the Chamber of Commerce, Rotary International, and was a Community Chest Officer.

C. H. SNYDER, M. D.

Clarence H. Snyder, M.D., Grand Rapids, died March 3 at the age of 70.

A graduate of Greenville College (Illinois) and the University of Michigan, where he received M.S. and M.D. degrees, Doctor Snyder was honored with a doctor of science degree from Greenville College in 1948.

Doctor Snyder maintained a private practice and also served as orthopedic surgeon on the staffs of Butterworth, St. Mary's, Blodgett Memorial, Sunshine, and Children's Hospitals. He was chief of staff at Butterworth from 1949 until 1953.

During World War I Doctor Snyder served in the Medical Department of the United States Army, in France, and in 1918 he served as consultant in orthodepic surgery to the Surgeon General, Far East Command.

Doctor Snyder was a Fellow of the American College of Surgeons and the American Academy of Orthopedic Surgery, and he held memberships in the Society of International Orthopedics and Traumatology, Kiwanis International, and Sigma Xi and Phi Sigma medical fraternities.

ARTHUR H. STEELE, M.D.

Arthur H. Steele, M.D., Paw Paw, died February 23 at the age of 66.

Doctor Steele received his M.D. degree from the University of Michigan Medical School in 1925.

CONTINUED ON PAGE 544

Tandearil®
oxyphenbutazone

Therapeutic Effects: Tandearil is a nonhormonal compound which may rapidly resolve inflammation and help restore normal joint function. Its action does not affect pituitary-adrenal function or impair immune responses. Its value in osteoarthritis is especially noteworthy because this disorder responds inconsistently to steroids and is often resistant to salicylates. Further, indomethacin is limited only to osteoarthritis of the hip, whereas oxyphenbutazone is effective in all forms of the disease.

Contraindications: Edema; danger of cardiac decompensation; history or symptoms of peptic ulcer; renal, hepatic or cardiac damage; history of drug allergy; history of blood dyscrasia. The drug should not be given when the patient is senile or when other potent drugs are given concurrently.

Warning: If coumarin-type anticoagulants are given simultaneously, watch for excessive increase in prothrombin time. Pyrazole compounds may potentiate the pharmacologic action of sulfonylurea, sulfonamide-type agents and insulin. Carefully observe patients receiving such therapy. Use with great caution in the first trimester of pregnancy.

Precautions: Obtain a detailed history and a complete physical and laboratory examination, including a blood count. The patient should be closely supervised and should be warned to report immediately fever, sore throat, or mouth lesions (symptoms of blood dyscrasia); sudden weight gain (water retention); skin reactions; black or tarry stools or other evidence of intestinal hemorrhage. Make regular blood counts. Discontinue the drug and institute countermeasures if the white count changes significantly, granulocytes decrease, or immature forms appear. Use greater care in the elderly and in hypertensives.

Adverse Reactions: The most common are nausea, edema and drug rash. The drug has been associated with peptic ulcer and may reactivate a latent peptic ulcer. Infrequently, agranulocytosis, or a generalized allergic reaction may occur and require withdrawal of medication. Stomatitis, salivary gland enlargement, vomiting, vertigo and languor may occur. Leukemia and leukemoid reactions have been reported but cannot definitely be attributed to the drug. Thrombocytopenic purpura and aplastic anemia may occur. Confusional states, agitation, headache, blurred vision, optic neuritis and transient hearing loss have been reported, as have hyperglycemia, hepatitis, jaundice, and several cases of anuria and hematuria. With long-term use, reversible thyroid hyperplasia may occur infrequently. Moderate lowering of the red cell count due to hemodilution may occur.

Dosage in Osteoarthritis: The initial daily dosage in adults is 300-600 mg. in divided daily doses. When improvement occurs, dosage should be decreased to the minimum effective level; this should not exceed 400 mg. daily, and is often achieved with only 100-200 mg. daily.

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Sperling, I.L.: 3 Years' Experience with Oxyphenbutazone in the Treatment of Rheumatic Disorders, Applied Therapeutics 6:117, 1964. — 76.9% of 407 patients

Watts, T.W., Jr.: Treatment of Rheumatoid Disorders with Oxyphenbutazone, Clin. Med. 73:65, 1966. — 84.6% of 39 patients

Please see adjoining page for brief prescribing summary.

TA-4919 PC

IN MEMORIAM (continued)

He was a member of the American Legion and Phi Chi medical fraternity.

Active in medical societies, Doctor Steele was a former member of the MSMS Public Relations Committee and a past president of the Van Buren County Medical Society.

He was affiliated with Lake View Community Hospital, Paw Paw, and Bronson Methodist and Borgess Hospitals, Kalamazoo.

C. L. TOMSU, M.D.

Charles Lewis Tomsu, M.D., Detroit, died February 20 at the age of 75.

A graduate of the University of Illinois Medical School, Doctor Tomsu was a general practitioner and was affiliated with Harper Hospital. During World War I Doctor Tomsu served with the medical corps.

Further information was not available at time of publication.

PLAN A
Springtime Visit
TO DEARBORN

Spring is always a delightful time to come to Dearborn and *The Dearborn Inn*. You'll want to discover America's past at Henry Ford Museum and Greenfield Village just next door, or take a Ford Plant Tour. Or, a 20-minute drive to downtown Detroit's new look, a few minutes more to Canada by bridge or tunnel.

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GENERAL PRACTICE OPPORTUNITY: in association with three established General Practitioners in a suburban city near Detroit. Hospital privileges available at three hospitals. Salary and percentage leading to partnership after one year. Contact: Thomas Ganos, M.D., 6742 Park Ave., Allen Park, Mich. 48101. Phone DUnkirk 1-5675.

EXCELLENT OPPORTUNITY in the City of Troy. Residential population 27,500; Industrial employment over 8,000; Business & commerce — about 3,000 employed; School enrollment 4,800. Presently there are no M.D.'s (according to telephone yellow pages). Now leasing for new doctors' building at I-75 and 16 Mile Rd. Agreements already signed with a General Surgeon, Dentist, Optometrist, Professional Pharmacist and Medical Technologist. Light, air conditioned offices will be designed to order. All conveniences including ample free parking will be provided. ANGUS McLAY, Broker — 177 W. Big Beaver, Troy, Mich. 48084. Phone (313) 689-0555.

NEWBERRY in need of General Practitioner and a surgeon. Population including surrounding area about 5,000. Excellent schools, churches of all denominations. Hospital opened February, 1966. An extended care Facility is being made available in former Hospital building. Newberry is a paradise for a fisherman or hunter. Contact: Administrator, Helen Newberry, Joy Hospital, Newberry, Michigan.

BOYNE CITY: General Practitioner urgently needed to serve this growing community located in the heart of Northern Lower Michigan. Excellent opportunity. Three Hospitals within close radius. For further information please contact: Dr. Richard L. Fish, Boyne City Chamber of Commerce.

FOR LEASE: Suite available in June 1967 in Dearborn Professional Building, Military at Monroe, Dearborn, Michigan. Perfect set-up for eye specialist and/or ear, nose & throat specialist. Other specialties in building. Write or Call LO 1-7919 for appointment. Joseph M. Caputo, M.D., 205 Dearborn Professional Bldg., Dearborn, Michigan

PSYCHIATRIC RESIDENCIES July, 1967: Approved three-year progressive program in Metropolitan Detroit area. University associations. Teaching staff of board men, psychoanalysts, professors, outstanding visiting lecturer. Active research. Modern physical plant. Salary $8,352 to $9,500. Five-year career program $9,500 to $17,184. Subject to Legislative approval, this rate will be increased to $8,978 to $10,213 and $10,232 to $13,737 as of July 1, 1967. All Michigan Civil Service benefits. General practitioners completed internship four years ago may be eligible for NIMH stipends of $12,000 per year. Write: Director of Education and Research; Northville State Hospital, Northville, Michigan 48167.

PSYCHIATRIC PRACTICE, take over office and lease. City of over 100,000 in central Michigan. Large excellent practice opportunity, will introduce. Available July 1967. Contact: Box 7, 120 West Saginaw Street, East Lansing, Michigan.

WANTED: General Practitioner to take over practice in Bay City. Ample work for General Practitioner here. Good hospitals; open to General Practitioners. Good Schools. All winter and summer sports close at hand. Reply 1107 Columbus Avenue, Bay City, Michigan 48706.

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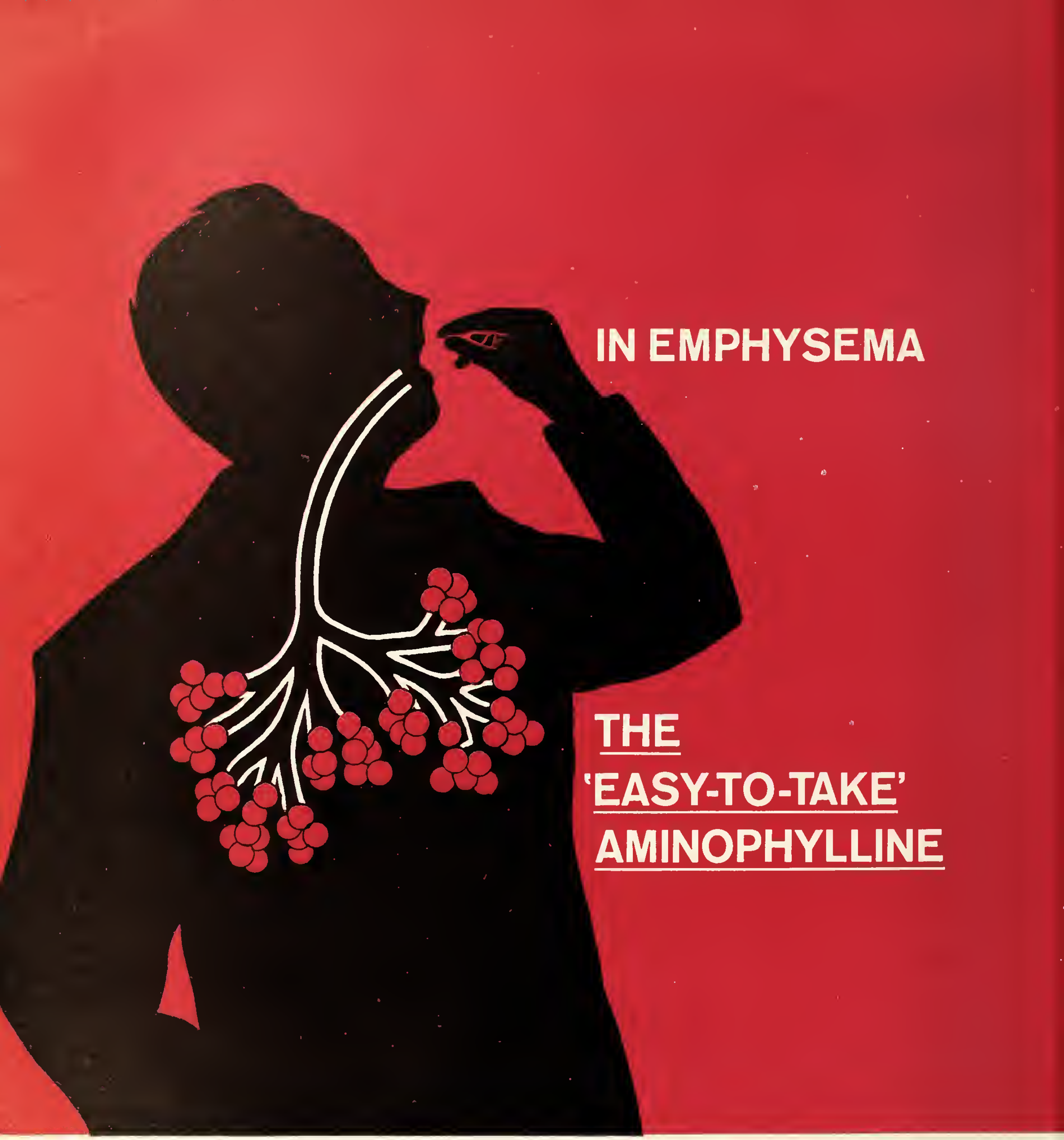
Calumet Public Hospital is in need of two General Practitioners and Surgeons. Recently remodeled with complete, up-to-date Lab, Pathology and X-Ray and Surgery departments. Population including surrounding area about 13,000. Excellent schools, churches of all denominations. Situated in the Copper Country of Michigan, a haven for outdoor sportsmen. Contact — Administrator, Calumet Public Hospital, Laurium, Michigan.

RADIOLOGY RESIDENCY: Newly approved residency in recently expanding 711 bed suburban medical-center type hospital. Detroit metropolitan area. Latest type equipment throughout. Broad variety of work with emphasis on special procedures. Cobalt 60 therapy and hyperbaric oxygen chamber; nuclear medicine and radiological physics; 8 full time radiology staff members; 4 physicists. Excellent opportunity for learning and experience without heavy service commitment. Good salary structure. Apply to James E. Lofstrom, M.D., Director, Department of Radiology, William Beaumont Hospital, 3601 W. 13 Mile Road, Royal Oak, Michigan 48072.

WANTED: A locum Tenens for the months of July and August in a GP office doing OB and surgery. Office is in hospital, located in southern Michigan. Due to expanding of hospital, need a partner capable of handling this type of practice. Will consider a trial offer. Excellent opportunity for the right man. Contact: Bowers H. Growt, M.D., Addison, Michigan.



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Stuart M. Gould, Jr., M.D.
Leonard E. Himler, M.D.
Stephen C. Mason, M.D.

Richard D. Watkins, M.D.
Rudolf E. Nobel, M.D.
Sydney Joseph, M.D.
James R. Driver, M.D.

about doctors and their friends

Meryl M. Fenton, m.d., Detroit, has been elected second vice president of the American College of Allergists, and he recently spoke at the National Allergy Seminar on "Office Practice of Allergy."

Doctor Fenton has also been named an honorary member of La Sociedad de Cirugia del Hospital Juarez.

A special tribute for "outstanding assistance" to the Muskegon Children's Home was recently given to E. H. Wagenaar, m.d., Muskegon. Doctor Wagenaar was honored for his twenty years of service to the Home and was presented an honorary life membership in the Home's agency.

Directing a Wayne State University research project on "Drug Ototoxicity in Cats" will be T. Manford McGee, m.d., Oak Park. The Schering Corporation has granted $27,142 for the study at Wayne State University School of Medicine.

Serving on the State Aging Commission's technical review committee, which reviews applications for local grants under the federal Older Americans Act, is A. Hazen Price, m.d., Detroit. Doctor Price is chairman of the MSMS Committee on Aging.

Joseph W. Hess, m.d., Detroit, will supervise studies on metabolism at Wayne State University School of Medicine. The project is supported by a grant from the Michigan Chapter of the Arthritis Foundation.

Participating in the recent Pharmacy-Medicine-Nursing Conference on Health Education, sponsored by the University of Michigan's College of Pharmacy, Medical School, and School of Nursing, were four Michigan physicians. They are William N. Hubbard, Jr., m.d., Dean of the U-M Medical School; James T. Howell, m.d., Executive Director of Henry Ford Hospital; John R. G. Gosling, m.d., Associate Professor of Obstetrics and Gynecology at the University Medical School; and Chris J. D. Zarafonetis, m.d., Professor of Internal Medicine at the Medical School.

V. K. Volk, m.d., continues as Saginaw County Health Director on a contractual basis, after resigning in February when he reached mandatory retirement age. He has been the health director for 31 years.

Andrew D. Hunt, Jr., M.D., MSU Dean of the College of Human Medicine, and Scott N. Swisher, M.D., Professor of Medicine, served as advisers and consultants for the development of a medical school at the University of Nigeria at Enugu. Both mem were on a three-week assignment at the University of Nigeria.

L. R. Martin, M.D., Detroit, Medical Director at Detroit Edison Company and a graduate of Olivet College, was honored recently by the Olivet College Alumni Association at its annual Founders' Day Dinner.

C. G. Clippert, M.D., Grayling, has received a Certificate of Appreciation for 25 years of service to the Selective Service System from the President, Governor Romney, Lewis B. Hershey, Director of the Selective Service, and Arthur Holmes, State Director of Selective Service.

Recently appointed to the East Central District Health Facilities Planning Council are three Michigan physicians. They are John C. Benson, M.D., Flint; Robert I. Lurie, M.D., Saginaw; and Ezra V. Bridge, M.D., Port Huron.

Robert J. Mason, M.D., Birmingham, Chairman of The Council, made the appointments to the 15-county District Steering Committee at the Planning Council's request for physician members.

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VOLUME 66, APRIL 1967, NUMBER 8 — NEWS EXTRA — DEADLINE APRIL 10

MSMS Follows 77 Bills in Legislature; Pace Quickens after April Deadline

With Thursday, April 13, set by the Legislature as the deadline for action by Senate committees on Senate bills, and House of Representatives committees on House bills, MSMS representatives are extremely active in the State Capitol as this issue of the *News Extra* goes to press.

Testimony has been presented on three occasions favoring repeal of the 1937 Basic Science Law, twice before the House Public Health Committee and once before the senate State Affairs Committee, with MSMS President-Elect Bradley M. Harris, M.D., speaking before the Senate Committee. William N. Hubbard, M.D., Dean of the University of Michigan Medical School, also joined Doctor Harris in supporting MSMS' bill to permit the Board of Registration in Medicine to accept certificates of the National Board of Medical Examiners. This bill, SB 637, has been recommended to the full Senate by the Committee.

Another MSMS bill which has been approved by a Senate committee is SB 339, a proposed law which would provide immunity for physicians serving as committee members to review the qualifications of hospital staffs (tissue committees). Similarly, MSMS' bill to amend the PKU-reporting law has been recommended for passage by the Senate Health, Social Services, and Retirement Committee after receiving testimony from Richard J. Allen, M.D., of the University of Michigan.

In the House of Representatives Lansing physician Norman D. Henderson, M.D., appeared before the House Public Safety Committee, and as a result the Committee has recommended passage of HB 2482 which would prohibit the sale, for use in private homes and vehicles, of certain types of fire extinguishers which could create deadly gasses.

Testimony has been presented by E. Freeman Hersey, M.D., Kalamazoo, in support of a proposed bill to abolish the coroner system in favor of medical examiners in all Michigan counties; MSMS has appeared in favor of its proposal to require the Director of the Michigan Department of Mental Health to be a qualified psychiatrist or neurologist with administrative experience; testimony has also been presented by Leo W. Walker, M.D., Lansing, in support of MSMS-endorsed HB 2773 for the licensing of medical laboratories; MSMS has successfully requested amendments to a proposed law for the licensing of hospitals (SB 16).

Altogether, as this issue goes to the printer, the MSMS Legal Affairs Committee has selected 45 House proposals and 32 Senate bills for surveillance. Four "Medigrams" have been written and mailed to physicians involved in direct legislative action, one each week following the March 16 deadline for bill introduction.

A proposal (HB 2707) to abolish the Boards of Registration in both medicine and osteopathy and to create a combined board has been examined by MSMS and found to require considerable amendment. MSMS has indicated its willingness to cooperate in an intensive study of this proposal, possibly through assisting a study committee of the Legislature, so that a *suitable* bill can be prepared for future introduction to the lawmakers.

MSMS Delegates Voice Views On AMA Insurance Dispute

The MSMS Delegation to the AMA recently expressed its stand to the AMA Board of Trustees on the current issue over the AMA group disability insurance program. The Michigan Delegates wired their views individually, and the entire delegation was polled for a Michigan statement.

The AMA Board now has decided to refer the matter to the June meeting of the AMA House of Delegates.

Interested MSMS members may read the details in *The AMA News.*

MSMS Turns Spotlight On Family Life Education

A current two-month educational effort in Family Life Education is underway by the Michigan State Medical Society with many cooperating state agencies and organizations.

"Within MSMS, the April-May project seeks to convince every M.D. that he has a vital role to play in Family Life Education," explains James Harryman, M.D., Chairman.

"THE PROJECT provides excellent opportunities too, to work with schools, churches, clubs and others to improve the family in our society," Doctor Harryman continued.

MSMS members interested in assisting in this timely public-service project may obtain sample speeches, bibliographies, background materials, etc., by writing to MSMS, 120 West Saginaw, East Lansing.

MSMS has taken the leadership in this short-range educational effort with the help of the state departments of public health and education and also the state commissions concerned with youth and with Human Resources. Cooperating too are the Michigan Council of Churches and other concerned organizations.

THE COMMITTEE has defined Family Life Education as "a positive approach to strengthening the family for its vital tasks for nurturing healthy personalities, developing sound values, and fostering satisfying, constructive human relations."

DOCTORS COOPERATE IN CORNELL STUDY

May 1 marks the start of an intensive study of the causes and effects of automobile accidents in 17 northern and eastern Michigan counties. A six-month program, conducted nationwide by Cornell University, will be carried out in Michigan by the Michigan State Medical Society, Michigan Department of Health, State Police, and Michigan Hospital Association.

The counties to be included are Bay, Arenac, Iosco, Genesee, Huron, Lapeer, Midland, Oakland, Sanilac, Shiawassee, Tuscola, Alcona, Gladwin, Ogemaw, Oscoda, and Roscommon.

MUSKEGON — Robert J. Baker, M.D., Director of the Division of Surgery at the Cook County Hospital, will be the featured out-of-state visiting speaker at the Symposium on Trauma, April 26 at the Holiday Inn, Muskegon.

ANN ARBOR — Joining several Michigan speakers at the Spring Meeting of the Michigan Thoracic Society, May 4, at Ann Arbor, will be Hollis P. Boren, M.D., University of Colorado School of Medicine. The Clinical Conference will begin at 10 a.m. at the VA Hospital, with the afternoon session at the U-M Medical Center. E. G. Nedwicki, M.D., President, will preside at the 2 p.m. business meeting.

Team Doctors, Coaches To Hear Forsythe, Others May 25, U-M

Charles Forsythe, Executive D rector of the Michigan Hig School Athletic Association, wi be one of the featured speakers a the Second Annual MSMS Cor ference on the Medical Aspects c High School Sports at the Unive sity of Michigan, Thursday, Ma 25.

The 1967 Conference is bein planned by the MSMS Committe on the Medical Aspects of Orgar ized Athletics for both doctors an coaches. The subject matter wi be of interest to both and wi cover football, basketball, trac weight lifting, and other subject

See program and reservatio blank on Page 552.

ADD: IN MEMORIAM

In addition to the names r ported in the April "In Memo iam," news of the following deat has reached the MSMS Headqua ters. Details will follow in the Ma issue of *Michigan Medicine*:

William P. Pope, M.D., Dec tur, died March 26.

Wilbert T. Claxton, M.D., Bri ton, died March 28.

Charles P. Drury, M.D., Ma quette, died March 24.

Floyd F. Gibbs, M.D., Gran Rapids, died April 20.

John L. Glees, M.D., Gross Pointe, died March 2.

Bert A. Greiner, M.D., Detroi died March 21.

Lucien S. Griffith, M.D., Gran Rapids, died March 17.

Laurence W. Hayes, M.D., How ard City, died April 1.

Hans Armin Jarre, M.D., Gross Pointe Farms, died Januar 20.

George O. Knutson, M.D., N gaunee, died March 19.

Albert F. Litzenburger, M.D Boyne City, died March 26.

Hudson Coming
For MAP Congress

AMA President Charles L. Hud-
on, M.D., will be one of the fea-
ured speakers at the 8th Annual
Congress of the Professions at the
tatler Hilton Hotel, Detroit,
pril 28-29.

Doctor Hudson will join other
ational professional association
residents for a general assembly,
riday afternoon, April 28. "Their
iscussion will relate directly to
ne Congress theme of 'The Pro-
ssions: Supervision—Security—Sur-
ival.' They will pull no punches
n telling you the potential in-
ome, freedom, strengths, and priv-
eges of the professions in the
orld of legislative change, collec-
ve bargaining and moral upheav-
l," according to MAP President
dwin H. Young, P.E., Ann Arbor.

The MAP Congress will offer a
ll day of activities Friday, April
8, and a morning program on Sat-
rday, April 29.

IcCleave at MSU, May 9

EAST LANSING — Physicians
om the Lansing area are invited
hear the Rev. Paul B. McCleave,
L.D., Director of the AMA De-
artment of Medicine and Reli-
on, who will present the 1967
harles Maurice Yates Memorial
ecture on "Paradoxes in Modern
Iedicine" at Kellogg Center,
ISU, on May 9 at 7:30 p.m.

MSMS is cooperating with other
roups in presenting the program.

Jerome Conn, M.D., right, Ann Arbor, gave the annual Beaumont Lecture, April 3 at the Wayne County Medical Society meeting, the program arranged by Conrad Lam, M.D., left. Doctor Conn, Professor of Internal Medicine at the University of Michigan Medical School, discussed "Primary Aldosteronism. A Curable Form of Hypertension."

---

99 Candles Soon
For WSU Alumni

The 1967 Wayne State University School of Michigan Alumni Association Clinic Day and Reunion Banquet will take on some special color as the physicians look forward to the big 1968 event—the Centennial.

The 99th Annual Alumni Day will be held May 17 at the Sheraton-Cadillac Hotel.

Detailed information about the event appears in the regular April issue of *Michigan Medicine.*

UT OUT AND RETURN THIS FORM
O ORDER VALUABLE MATERIALS

The following materials may be useful to you. Check any item(s)
ired, cut out the form, and mail it in an envelope to MSMS, 120
est Saginaw, East Lansing, Michigan 48823. (Your address already is
the back of this same cut-out area of the page.)

__ **Program for MSMS Conference for Team Doctors and Coaches on the Medical Aspects of High School Sports, University of Michigan, May 25.**

__ **Program for Michigan Association of the Profession's 8th Annual Congress of the Professions, Statler Hilton Hotel, Detroit, April 28-29.**

__ **Program for MSMS Conference on Medical News Reporting, University of Michigan, May 12.**

__ **Membership Application for MDPAC-AMPAC.**

__ **Baby Emergencies Poster, produced by Michigan Health Council.**

Begin Spring PG Series

The first three MSMS Postgraduate Medical Education Programs will be held in April with 15 more to follow in May across the state.

The April events, with MSMS sending medical authorities from the U-M and WSU Medical Schools, will be at Petoskey, April 13; Alpena, April 20; and Grayling, April 27.

A Spring Program booklet has been sent to all physicians in the area served by the conferences.

Physicians to Promote '67 Michigan Week

"Michigan Week provides a two-way opportunity — Doctors can promote their state by promoting their profession, and by promoting their professions they promote Michigan."

That is the broad appeal to MSMS members to participate actively in Michigan Week, May 21-27.

Payne Leads Team To Marquette

"Appreciate having this in the Upper Peninsula."

That was one of several similar comments made by officers of the U.P. county medical societies during the Upper Peninsula regional seminar held there recently by MSMS.

MSMS President C. Allen Payne, M.D., and three staff members flew up to Marquette for the afternoon-evening workshop. In the past very few of the Upper Peninsula medical leaders have been able to come to Detroit for the former county officers conferences.

The Marquette regional meeting and all others held so far at Grand Rapids, Flint, Gaylord, East Lansing, and Kalamazoo have scored very high with the participants.

Fill in and mail to MSMS, 120 West Saginaw, East Lansing 48823

Please Register Me For The Conference, May 25 For Physicians and Coaches

I will attend the MSMS Conference on Medical Aspects of High School Sports at the University of Michigan, May 25. I understand the lunch is dutch-treat.

Name

Street

City

MSMS Conference On Medical Aspects Of High School Sports

M7330 Medical Science Building
U-M Medical Center, May 25

9:30 A.M. to 10:00 A.M.
Registration

10:00 A.M. to 10:30 A.M.
Study of Major Knee Injury Mechanisms; Thomas R. Peterson, M.D., Orthopaedic Surgeon, Ann Arbor.

10:30 A.M. to 11:00 A.M.
The Value of Weight Training and Power Lifting in Conditioning Athletes; Dennis R. Burke, M.D., Health Service, the University of Michigan, Team Physician.

11:00 A.M. to 11:30 A.M.
Genito-Urinary Dysfunction and Injuries in Athletes; Robert Anderson, M.D., Internist, Health Service, the University of Michigan, Team Physician.

11:30 A.M. to 12:00 Noon
Prevention and Treatment of Ankle Injuries, Gerald A. O'Connor, M.D., Orthopaedic Surgeon, the University of Michigan, Team Physician.

12:00 Noon to 1:15 P.M.
Luncheon Break

1:15 P.M. to 2:00 P.M.
Demonstrations in Techniques o Taping; James Hunt, Head Trainer, the University of Michigan Gayle Robinson, Head Trainer Michigan State University; Millar Kelley, Athletic Trainer, Detroi Lions.

2:00 P.M. to 3:00 P.M.
The Background and Present Da Status in the Use of Cryotherap in Athletic Injuries; W. D. Paul M.D., Team Physician, Universit of Iowa Athletic Teams, Chief o Physical Medicine, State Universit of Iowa Hospitals.

3:00 P.M. to 3:15 P.M.
Coffee Break

3:15 P.M. to 3:30 P.M.
Responsibility in Safeguarding th Health of the Athlete; Charles E Forsythe, Director, Michigan Hig School Athletic Association.

3:30 P.M. to 3:45 P.M.
Simple Foot Problems in Athletics James Feurig, M.D., Team Ph sician, Michigan State Universit Director of Health Service, Michigan State University.

3:45 P.M. to 4:30 P.M.
Panel — Program Participants Athletic Injuries — Questions and Answers

(Cosponsored by the MSMS Co mittee on the Medical Aspects o Organized Athletics and the Un versity of Michigan Department o Postgraduate Medicine.)

MICHIGAN MEDICINE

MICHIGAN STATE MEDICAL SOCIETY

Published semi-monthly, Trimonthly in December and February; 26 issues, by the Michigan State Medical Society as its official journal. Second class postage paid at Lansing, Michigan. Yearly subscription rate, $9.00. Printed in USA. All communications should be addressed to Publications Committee, Michigan State Medical Society, 120 West Saginaw Street, East Lansing, Michigan 48823. © 1967 Michigan State Medical Society. Phone: Area Code 517, 337-1351.

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MICHIGAN MEDICINE

MICHIGAN STATE MEDICAL SOCIETY
VOLUME 66, NUMBER 9
MAY, 1967

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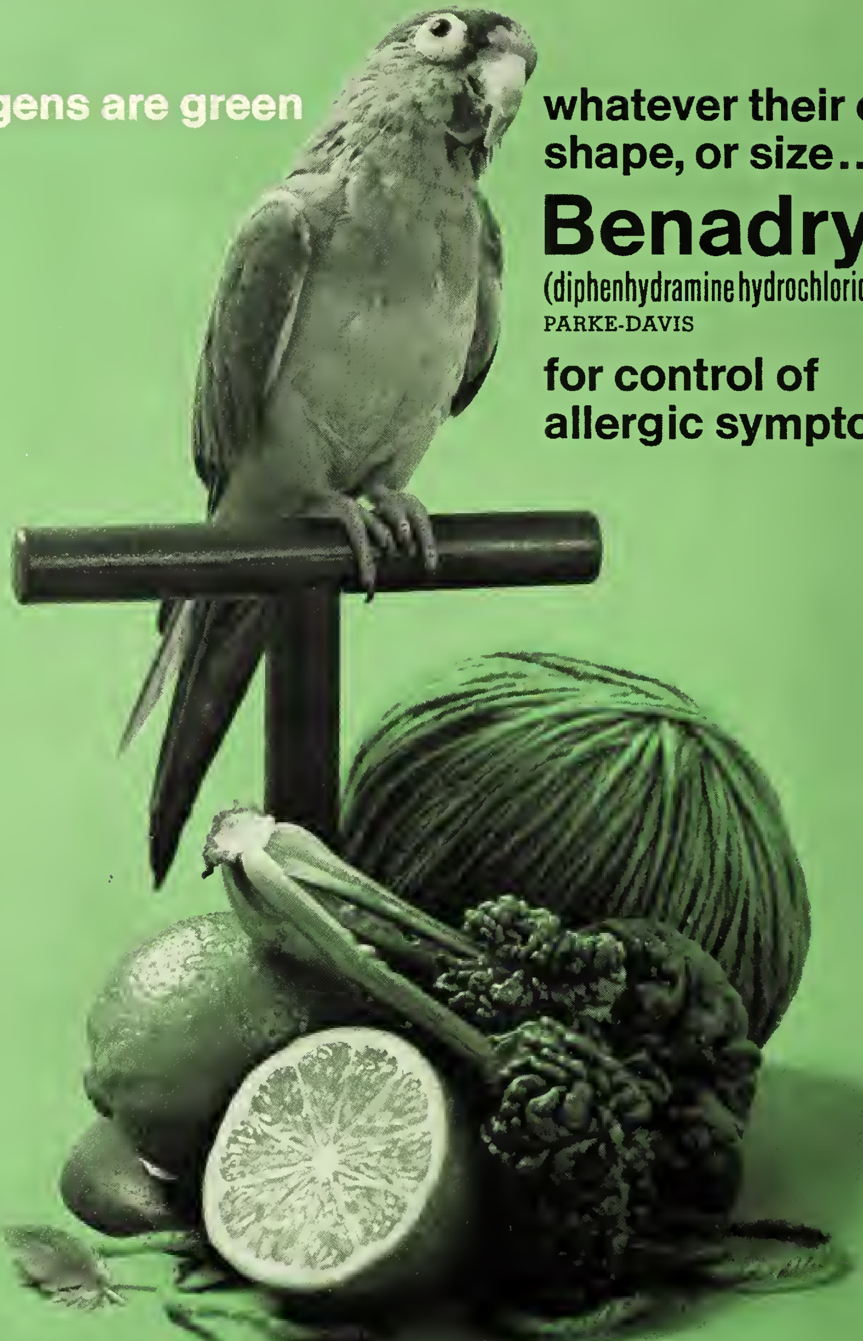
Michigan Week May 21-27
A Dual Opportunity
To Promote Medicine and Michigan



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Literature on indications and dosage available on request.

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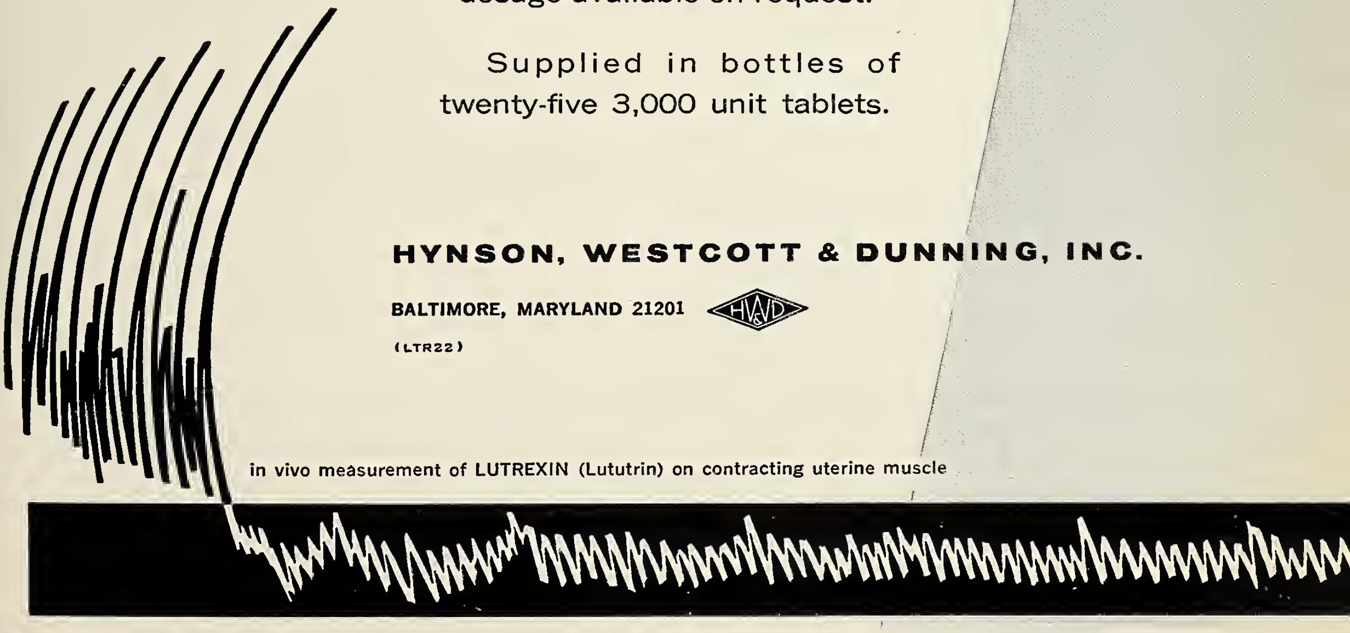

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pyelitis?
urethritis?
prostatitis?

in any case,
usually gram-negative*

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(initial adult dose)

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Brand of
nalidixic aci

a specific anti-gram-negative

eradicates most urinary tract infections...

- Low incidence of untoward effects; no fungal overgrowth, crystalluria, ototoxic or nephrotoxic effects have been observed.
- "Excellent" or "good" response reported *in more than 2 out of 3* patients with either chronic or acute gram-negative infections.[1]

Indications: Urinary tract infections caused by gram-negative and some gram-positive organisms.

Side effects: Mainly mild, transient gastrointestinal disturbances; in occasional instances, drowsiness, fatigue, pruritus, rash, urticaria, mild eosinophilia, reversible subjective visual disturbances (overbrightness of lights, change in visual color perception, difficulty in focusing, decrease in visual acuity and double vision), and reversible photosensitivity reactions. Marked overdosage, coupled with certain predisposing factors, has produced brief convulsions in a few patients.

Precautions: As with all new drugs, blood and liver function tests are advisable during prolonged treatment. **Pending further experience, like most chemotherapeutic agents, this drug should not be given in the first trimester of pregnancy. It must be used cautiously in patients with liver disease or severe impairment of kidney function.** Because photosensitivity reactions have occurred in a small number of cases, patients should be cautioned to avoid unnecessary exposure to direct sunlight while receiving NegGram, and if a reaction occurs, therapy should be discontinued. The dosage recommended for adults and children should not arbitrarily be doubled unless under the careful supervision of a physician. Bacterial resistance may develop.

When testing the urine for glucose in patients receiving NegGram, Clinistix® Reagent Strips or Tes-Tape® should be used since other reagents give a false-positive reaction.

Dosage: Adults: Four Gm. daily by mouth (2 Caplets® of 500 mg. four times daily) for one to two weeks. Thereafter, if prolonged treatment is indicated, the dosage may be reduced to two Gm. daily. Children may be given approximately *25 mg. per pound* of body weight per day, administered in divided doses. The dosage recommended above for adults and children should not arbitrarily be doubled unless under the careful supervision of a physician. Until further experience is gained, infants under 1 month should not be treated with the drug.

How supplied: Buff-colored, scored Caplets® of **500 mg. for adults**, conveniently available in bottles of 56 (sufficient for one full week of therapy) and in bottles of 1000. **250 mg. for children**, available in bottles of 56 and 1000.

References: (1) Based on 23 clinical papers, 1512 cases. Bibliography on request. (2) Bush, I. M., Orkin, L. A., and Winter, J. W., in Sylvester, J. C.: Antimicrobial Agents and Chemotherapy—1964, Ann Arbor, American Society for Microbiology, 1965, p. 722.

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Winthrop Laboratories, New York, N. Y. 10016

*As many as 9 out of 10 urinary tract infections are now caused by gram-negative organisms: E. coli, Klebsiella, Aerobacter, Proteus, Paracolon or Pseudomonas[2]... However, infections of the urethra and prostate caused by non-gonococcal gram-negative organisms are believed to be less prevalent.

MICHIGAN MEDICINE

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Volume 66, Number 9

The cover focuses attention on Michigan Week and urges doctors to help observe the special week. The cover design was by Kim Cortright, journalism student at Michigan State University. The photos were provided by the Michigan Tourist Council, the Michigan Department of Highways and the American Medical Association.

An article about Michigan Week appears in the blue "hot news" pages in the center of this issue.

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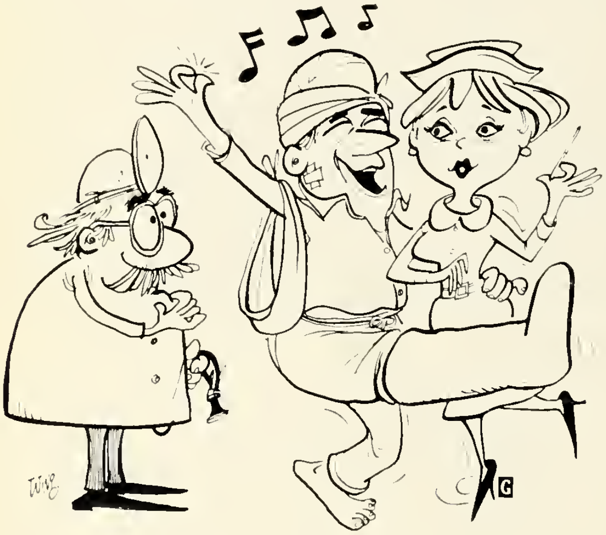
SUGGESTS COLOR BLINDNESS TEST

Obtain two color charts from a paint store. These are the ones with little rectangles showing the colors of the paint. The charts should have exactly the same colors so that they can be paired up. Cut out these rectangles leaving the backing paper on them. Lay the colored rectangles on the desk or table in random order. Have the patient match the colors in pairs.

Works fine with youngsters who do not know how to read yet.

—Mary L. Cretens, M.D., Director
Delta-Menominee District Health Department
Delta County Building
Escanaba, Michigan



Value Seen in Music

In 1888 American author Edward Bellamy had a far-fetched dream. In his novel *Looking Backward*, he described Utopia: "If we could have devised an arrangement for providing everybody with music in their homes, perfect in quality, unlimited in quantity, suited to every mood, and beginning and ceasing at will, we should have considered the limit of human felicity already attained."

With the inventions of radio and tape cartridges, music now is recommended by psychiatrists to create as well as relieve moods in the hospital, factory, office and home. The value of music in this sense is due partly to the enormous variety available—something for everyone—or as the 18th-century poet George Lillo put it: "There's sure no passion in the human soul/ But finds its food in music."

Work of Voluntary Associations Applauded

"Voluntary associations were powerful factors in the historical development of free enterprise as a way of life. They are today the system's best examples and staunchest defenders.

"The good habits of voluntary group action were learned early from the harsh necessities of the frontier. The colonists had to co-operate or perish and words like 'volunteer,' 'compact,' 'association,' 'town meeting' and 'committee' became meaningful in the increasingly dynamic American life and language.

"The social compulsions and neighborliness of the frontier demonstrated in the barnraising, the harvest-help and the wedding-shower persists in the team spirit shown in the elaborate network of voluntary social services which still bear a large share of the welfare burden. This gift for joining, for voluntary organization, has given rise to the vast number of associations representing all kinds of interests from religious, ethnic and cultural bodies to industry, trade and professional groups which provide the machinery for the day-to-day formation of opinions which govern public policy.

"It has been said that every situation, condition problem, idea, thought, interest or activity in the United States has a voluntary committee, organization or association to deal with it. All human interests and activities are somehow reflected by free moving groups in which all of us are participants in one way or another and which in total make up our way of life.

"The pervasive influence and impact of all this associated action accounts for most of what is uniquely American. Our best contribution to underdeveloped areas, rather than mere materia wealth, might well be guidance in the kind o human behavior and organization which, in our country, produced well-being."

(The above is quoted from a booklet "Your Answers About American Trade and Professional Associations" published by the American Society o Association Executives.)

EDITOR OFFERS PR CHALLENGE

"The important medical stories are still locked up behind hospital doors. There are many facet of the day-to-day workings of the medical profession which would make fascinating stories."

—Jack Bell: News Editor, *Kalamazoo Gazette*

president's message

GENERIC PRESCRIPTION OF DRUGS

For the past several years legislation on the state and national levels requiring mandatory prescription of drugs by "generic" name for recipients of federal and state medical-aid programs has been with us. Again, this year similar bills have been introduced into the Michigan Legislature and the Congress.

The announced reason for such legislation is to save taxpayers' funds. While such an objective is laudable, the action is being considered by individuals lacking complete knowledge and regard to scientific fact and the moral and legal responsibilities of physicians, pharmacists, and the government itself.

This subject is of vital importance to practicing physicians and must be thoroughly understood if appropriate action opposing such legislation is to be carried out. Among the many arguments or reasons given for opposing such legislation, three are prominent:

(1) Chemical equivalency of the primary agent or drug does not necessarily mean clinical or pharmacologic equivalency of the finished drug product. There are many examples in which the chemical identity of drugs does not equate precisely with their biologic activity. It is widely known that many factors in the manufacture of a drug product may significantly influence its clinical or pharmacologic action. Methods of manufacture vary from company to company, and it is very doubtful that identical methods of manufacture can be carried out by all companies, even though they begin with the same basic ingredients. Those experts who have studied this problem most carefully are thoroughly convinced that generic equivalency of drugs is largely a myth.

(2) The selection or use of drugs on the basis of price alone leaves much to be desired. Even though comparatively little is known about the quality control or efficacy of many of our newer or more sophisticated therapeutic agents, including antibiotics and steroid compounds, pre-award surveys used by the Defense Department to select drugs for military use revealed that 54 percent of the samples submitted by low bidders failed to pass the required tests.

(3) The prescription of a drug by a physician for the treatment of a patient represents his best clinical judgement based upon the history and examination of the patient and the training and experience of the physician. The essence of the various bills so far introduced is to permit the pharmacist to substitute one "generic" equivalent for another on the basis of price. In effect, if this type of legislation became law, it would permit the pharmacist to enter directly or indirectly into the practice of medicine, a condition not intended when these two professions were licensed. Under these conditions the legal liability of the two groups could be considerably altered.

More recently, Senator Russell Long of Louisiana has proposed that drugs be provided on an "established name basis." The details of this approach are not yet available, but presumably they would be patterned after the methods used by the Defense Department as mentioned above. If such is the case, the important factor is quality; price is of secondary importance.

No one can predict when action will be taken on such legislation. We sincerely hope that no action will be taken until serious discussion of all aspects of these ideas is carried out with all parties concerned.

Passage of this legislation is a serious and unwarranted intrusion of government into the practice of medicine. It must be opposed with all of the organized effort that we can develop.

It is most important that each physician keep himself well informed on this subject, be constantly vigilant, and acquaint his state and national legislators with the facts involved.

C. Allen Payne MD

about doctors and their friends

Raymond C. Bush, M.D., Midland, has been given the 1966 Distinguished Service Award by the Midland Junior Chamber of Commerce. The award is given annually to an outstanding leader in civic affairs.

Richard A. Rasmussen, M.D., Grand Rapids, appeared on a panel program, "Profile: A Dynamic Approach to the Patient Experiencing Chest Surgery," at the spring conference of operating room nurses, held recently in Grand Rapids.

Joseph F. Sadusk Jr., M.D., has been appointed to the newly-created position of vice president for medical affairs at Parke, Davis & Company. He assumed his new duties on April 1, and he is now responsible for the firm's medical affairs throughout the world.

The Public Health Service has granted $239,390 to support continuing research at Wayne State University Medical School. The research grant is under the direction of WSU Dean Ernest Gardner, M.D., Detroit.

A large collection of medical books and instruments bequeathed to Michigan Technological University by the late Simon Levin, M.D., Houghton, is now on display in Hubbell Hall at the University.

The medical staff, Hospital Auxiliary, and employes of the War Memorial Hospital held a reception in honor of Benjamin T. Montgomery, M.D., Sault Ste. Marie, who recently retired from practice.

Charles F. Whitten, M.D., Detroit, will direct a project of the United States Public Health Service for research and education, including support of a General Clinical Research Center at Children's Hospital, Detroit. The work is supported by grants from the Public Health Service.

Named to Dearborn's new Hockey Arena Study Committee was Robert R. Turner, M.D., appointed by Mayor Orville L. Hubbard. Doctor Turner joins seven other members of the citizens' advisory group.

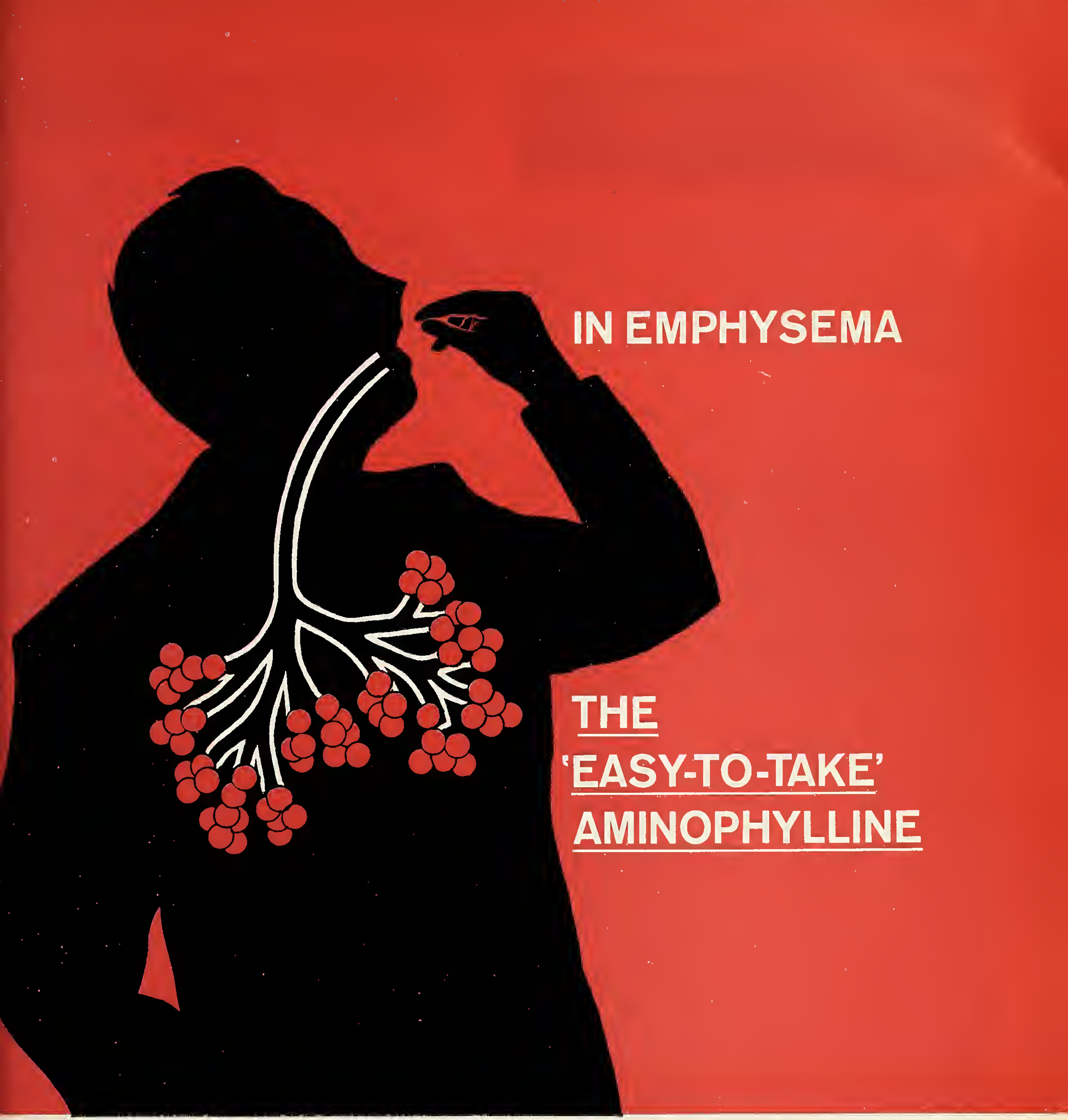
Speaking on epilepsy at a recent conference for educators was Craig Booher, M.D., Grand Rapids, Director of the Seizure Clinic at Blodgett Memorial Hospital. The conference was sponsored by the Kent County Chapter of the Michigan Education Association.

A Wayne State University research project entitled "Effect of Inhaled Substances on Sequential Ventilation" will be supported by $14,306 received from the American Medical Association. The project will be directed by Benjamin M. Lewis, M.D., Detroit.

Several Ann Arbor physicians participated in the program for the Michigan Dietetic Association's Spring Convention recently held at the University of Michigan. The speakers and their topics were: Richard Allen, M.D., "Recent Research in PKU;" Owen Haig, M.D., "Dietary Modification in the Treatment of Uremia;" George H. Lowrey, M.D., "Control of Diabetes in Children;" and C. Howard Ross, M.D., "Granny's Herbs and Witch Doctors." Albert C. Kerlikowske, M.D., gave the welcome.

The grandson of the doctor who treated John Wilkes Booth after the assassination of Abraham Lincoln recently addressed the Abraham Lincoln Civil War Round Table of Michigan. Richard Mudd, M.D., Saginaw, in his talk on "The Escape and Capture of John Wilkes Booth," told how his grandfather, Doctor Samuel A. Mudd, was involved in the assassination tragedy.

Joseph W. Christie, M.D., Harbor Springs, was the subject of a recent feature story in Detroit's *Free Press*. The article pointed out that Doctor Christie is the first year-round doctor Harbor Springs has had in more than a decade.



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mail bag

Michigan Medicine invites letters of 300 words or less for publication. Unsigned letters will not be considered; but signed letters will be printed anonymously if the author so requests.

Send letters to Publication Committee, MSMS, 120 West Saginaw, East Lansing, Michigan 48823.

Couldn't help but express my great admiration for *Michigan Medicine,* particularly this month's issue — it is a professional, well-written, well-edited, well-formatted, and beautifully printed book.

David L. Froh
Public Relations Director
Michigan United Fund

William W. Jack, M.D., Chairman
Maternal Health Committee
Michigan State Medical Society

Dear Dr. Jack:

Please permit me to thank you properly for the privilege of having been one of the speakers during last week's Sixth Annual Michigan Conference on Maternal and Perinatal Welfare in Flint. I enjoyed the experience immensely and, in addition, came away much instructed.

I would like to say how much I admire the manner in which the meeting was conducted, both in regard to the timing and the audience's questions. Your organization is a smoothly working one, enabling the audience to go away with the sensation that it has really been educated.

With repeated thanks for your many personal courtesies to me during my visit to Flint as well as for the invitation, I am

Sincerely yours,
S. Leon Israel, M.D.
Philadelphia

In the excellent article "Community Psychiatry and the Future State Hospital" (*Michigan Medicine,* March 1967), Doctor Hans Von Brauchitsch states that "as community mental health programs become more effective . . . a higher proportion of severely ill . . . patients will reside in State Hospitals. . . ."

We do not have enough experience in Michigan as yet, but some evidence to the contrary was adduced by Heath in a recent presentation, regarding the community psychiatry program in San Mateo County, California, one of the best known in the nation.

"It seemed possible that the availability of short term, intensive care in the community would turn out to mean that San Mateo's contingent of state hospital patients might be made up of a disproportionate large number of chronic patients. . . .

"Briefly, the study failed to demonstrate any statistically significant difference between the San Mateo County contingent and the average state hospital population."[1]

Further research is needed in this and many other areas of the field, as the center of gravity in treatment shifts from the state hospital bed to the homes, shops, factories, offices, and schools in the community.

Doctor Von Brauchitsch is to be congratulated for calling attention to this very important issue. *Michigan Medicine* also deserves credit for opening its pages to a series of very stimulating psychiatric papers.

Sincerely yours,
José J. Llinas, M.D.
Assistant Professor of Medicine
(Psychiatry)
College of Human Medicine
Michigan State University

---

1. Heath, D. Mental Health and the Community, *Bulletin*, Michigan Society for Mental Health, XXII, iii, 1-12 (1966).

Gentlemen:

I would appreciate receiving 25 copies of *Horisons Unlimited* with the insert for Michigan training facilities for distribution to younger patients of mine who might express an interest in one of the health fields. I have used this fine handbook to good purpose in the recent past and am pleased that the AMA and MSMS were able to publish such an informative booklet.

Very truly yours,
Louis R. Zako, M.D.
Allen Park

Have had favorable comments about the article you printed in January by Professor C. P. Hall of Temple University about "The Future of Health Insurance Prepayment and Medicine — A View of 1985."

Keep up the fine work.

Dale Kessler, M.D.
Grand Rapids

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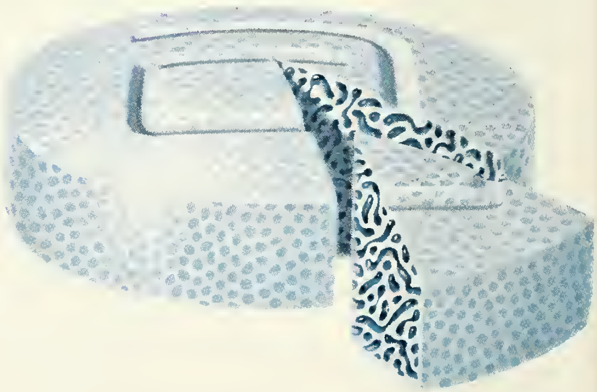

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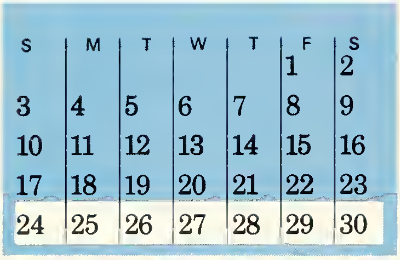

S	M	T	W	T	F	S
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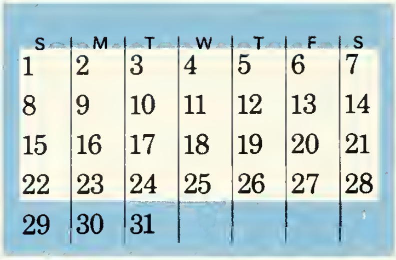

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1	2	3	4	5	6	7
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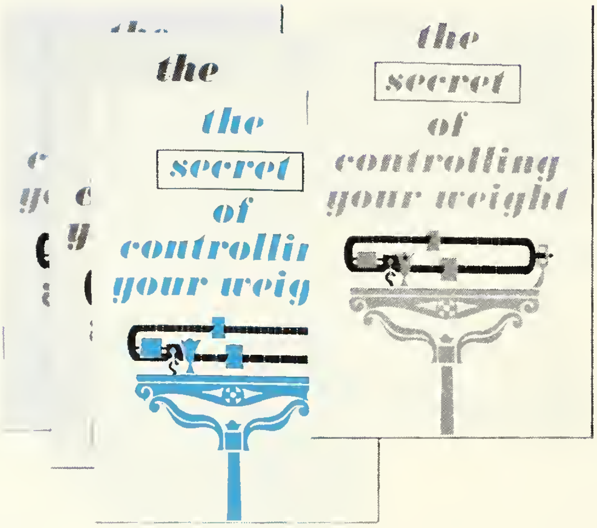

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The Role of the Physician In Family Life Education

BY S. LEON ISRAEL, M.D.
PHILADELPHIA

Physicians are cooperating with educators, ministers and others in a Family Life Education effort during April and May.

Family life education varies in content according to the type of teacher. The viewpoint of such counselors ranges from that of a physician who regards family life education as being chiefly sex education to that of a home economist who tends to stress household duties, kitchen budgeting, and home management. The sex education of an individual, indubitably a major portion of family life education, should be accomplished progressively at several levels by many agents and elements in our society. It has taken on added importance because of some major changes in our culture during the past 50 years — many of life's objectives such as entertainment and education are now customarily obtained outside the immediate family; there has been a notable equaling of the social roles of the two sexes; and a recognizable permissiveness prevails in the whole area of sex.

We have done away with the close supervision of chaperones and have relaxed the regulations that formerly controlled the association between the sexes during adolescence. In addition, we have

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Doctor Israel is associated with the Department of Obstetrics and Gynecology, School of Medicine, University of Pennsylvania, and the Pennsylvania Hospital.

Presented at the Michigan Conference on Maternal and Perinatal Welfare, Committee on Maternal Health, Michigan State Medical Society, Flint, Michigan, March 15-16, 1967.

Abstract: The physician must appreciate that family life education is more than imparting the details of an anatomic-physiologic process; it entails teaching a major part of human growth, both emotional and physical, as well as of the forces that mold an adult's interpersonal relationships. Sex education, a major portion of family life education, is accomplished by many agents and elements in our society; by the time an individual reaches adolescence, he has developed a series of well-rooted emotional reactions about sex. The physician is one of the valuable sources of sex education because he is usually the confidant of the family's hub, the mother. However, he must himself appreciate the importance of sexual relations and, of necessity, understand the primary role of sexuality in all aspects of living. He must avoid moralistic judgments and strive to deal constructively with all questions related to human sexual behavior, such as actions of teen-agers and geriatric sexuality. The physician must cooperate with other community agencies in the management of such problems as conception control, out-of-wedlock pregnancy, venereal disease, and the menace of illegal abortion.

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not resisted the intrusion upon our privacy by communications media. In viewing the present-day scene, the physician must accordingly appreciate that his role as a sex educator entails more than the imparting of the details of an anatomic-physiologic process. It embraces teaching people to understand the patterns of human growth, both emotional and physical, as well as trying to make them comprehend the forces that form an adult's interpersonal relationships.

Moreover, sex education by the physician contains major overtones of preventive medicine, an inherent value in all medical practice which the physician learns to foster early in his career. There are, however, additional reasons why a physician makes a good counselor for family life education within any community.

BENEFITS TO COUNSELLING BY PHYSICIANS

The evident advantages of having a physician carry out sex education may be summarized in the following three categories:

(1) *The physician usually has the respect of the community in which he works, particularly in the area of human relations.* In spite of the fact that the physician is not always well-informed about the many issues in which he is assumed to be educated, his neighbors and patients nonetheless regard him as one who is knowledgeable. In the field of sex education, such an ideal community image is perhaps more applicable to the gynecologist-obstetrician who finds himself well within the family circle because he is the confidant of the very hub of the family, the wife and mother.

In addition, and in time, he often acquires the same role for the family's adolescent daughter. As a gynecologist he learns that much of the advice he imparts and the kind of treatment he applies depends upon an appreciation of his patient's emotional problems. He knows also that he possesses no magic force that will find the cause of the patient's illness, exorcise it, and thus rid her of it. He is taught this lesson best as an obstetrician, whose duties cast him in the role of a Pygmalion — in the sense that he has the opportunity to fashion the manner in which many Galateas go through pregnancy.

As an obstetrician, he is also the very apotheosis of one who observes the unconsciously ritualistic habits of the members of our society, habits that express both the actual needs as well as the anxieties of people. Whether the latter are real or unreal, they are never more fixed or as provoking as they are during pregnancy.

(2) *Patients come to a physician expecting to receive specific advice, giving him an obvious advantage over other types of counselors in the community.* Moreover, such patients come usually with the humility suitable to those who seek help, expecting to cooperate with the physician for a period of time. Miraculous, instantaneous cures are not, as a rule, demanded.

(3) *The physician is knowledgeable in anatomy and physiology and, above all, is mindful of psychosomatic manifestations.* He knows that abnormal behavior — too long attributed to spells cast by enemies, to the devils, to the gods, to the unconscious, to parents, and even to the psychologic trauma of being born — is usually related to a series of realistic environmental burdens. He acknowledges that anxiety frequently motivates human behavior and is aware that denial of reality may prevent a personality breakdown. He has, in short, learned well Steiger's dictum, "There are no diseases, there are only sick people."[1]

One may, however, well ask — even in the face of these several stated advantages — whether or not *all* physicians are equipped to be counselors on the subject of sex.

REQUIREMENTS OF THE PHYSICIAN TO IMPART SEX EDUCATION

The first essential of a physician-counselor in this field is his willingness to counsel. Secondly, he must perceive that there is no single, clear-cut reply to any one of the innumerable problems related to sexuality that face our society today. Thirdly, his own character pattern and adult personality are of great importance in helping him to make decisions regarding patients in this area, greater than in many other portions of medical practice. Fourthly, he must recognize — as he does when he deals with specific illnesses — that the attitudes he encounters in relation to sexual matters are apt to be those that create anger, an emotion that may prevent the eventual solution of problems. He must ever remember to keep his eye on the sparrow as well as on the sparrow's injured wing.

Finally, in order to impart sex education at any level, the physician must be aware that this aspect of human life is encrusted with ignorance, fear, shame, and guilt. To be effective, he must have conquered his own prudery, identify himself as a sexual being, and be able to deal with his patients' sexual problems as he would with any other of their medical troubles, within the bounds of his knowledge and emotional comfort. He must himself appreciate the necessity of good sexual relations and understand the primary role of sexuality in all aspects of living.

SEXUALITY AS A LIFE FORCE

In carrying out his role as a counselor and guide in the area of sex education, the physician must comprehend that sexuality is a native component of life, a vital force among all humans. Sexuality is not something you do, but something you have. In fact, one thinks of it best by the declension: I have it, you have it, she has it, he has it, we have it, and all other mammals have it. Sexuality is an intrinsic, lifelong mammalian trait, one that is evident in all of our daily actions. Three special endowments account for the mammalian attribute of sexuality: the vascular ability to experience genital tumescence, the muscular capability of making rhythmic pelvic motions, and the competence of the nervous system to experience orgasm. It is this trio of characteristics that make sexual intercourse pleasurable. Such intercourse is so enjoyable that it is carried out overwhelmingly more often for pleasure alone than for the occasional purpose of reproduction.

A conservative estimate would be that of 1000 acts of sexual intercourse between married partners, 999 are performed solely for their enjoyment, and the remaining one may have a reproductive goal. Moreover, only the human being alone, among all mammals, has made the act a private one. By making sexual intercourse an area of learned behavior and by attempting to govern it according to cultural principles, we humans have ourselves created the layer of ignorance that covers it, a superstratum that in turn creates the problems of shame and guilt.

Countless opportunities are afforded the physician to carry out his role of sex educator. We may cite as an example the many teachable moments of premarital or marital counselling, a sphere of education that relates directly to advice concerning conception control as well as to expression of viewpoints about abortion, out-of-wedlock pregnancy, and venereal disease.

PREMARITAL COUNSELLING

Imparting information to a couple about to be married is one of the exceptional prophylactic roles played by a physician. To carry this off effectively, he must be able to discuss freely the pleasures of sexual intercourse, the differences between male and female sexuality, and the time it takes to establish compatibility during marriage.

All of these aims are best realized when the physician, having established rapport with the couple for whom he must have empathy, provides an atmosphere conducive to free inquiry. Without the latter, the couple is voiceless, and the questions stemming from basic insecurity and lack of knowledge are stilled. The physician must not assume that the couple *is* informed; whatever fragmentary

knowledge they possess is usually superficial and incomplete. Time should be spent in discussing the differences in sexual responsiveness of men and women, the variations in their readiness for intercourse, and the urgent importance of discarding previously held misconceptions about the other sex.

The giving up of taboos, the rules and regulations established by the dicta of society within families, requires understanding concerning the place of pleasure during intercourse, pleasure for *each* partner. The couple must be advised that attainment of the goal of partnership pleasure, the highest form of interpersonal relationship, is desirable, but it is not instantaneous. It is acquired with the passage of time. One of the disillusion-creating myths of our time is that "instant compatibility" takes place the moment the wedding ceremony is completed. The marital partners must first learn to live together by quarreling successfully.

The couple seeking premarital advice must therefore be given more than anatomic-physiologic information. Although this type of physical instruction stems directly from the professional skill of the physician, and although the gaining of such information prevents many tragedies of early marriage, the emotional components of marriage must not be ignored.

The couple must be told that sexual intercourse is the ultimate language of their love for each other, a form of communication that is expressive only in a setting of mutual trust as well as of affection. It must be perceived that a proper act of sexual intercourse requires each partner to have achieved an adult personality. Each must be sensible of the other to be able to experience the pleasure of giving as well as of receiving.

Finally, during such a premarital session, the physician must be keenly aware that present-day family living demands some knowledge of conception control.

THE NEED FOR CONCEPTION CONTROL

There is no longer doubt that if our earth is to remain a pleasant and productive home for mankind, population control must be universal. The high price of irresponsible parenthood is more evident now because the universal prolongation of life has made a notable change in the world's population. Its incredible growth has been so rapid that it beggars understanding (Table I). It is estimated that at the time St. Paul was writing to the Corinthians there were but 250 million people on the earth. By the time of Shakespeare, 1600 years later, the world's population had doubled; it doubled again in the next 200 — *not* 1,600 — years. The exponential growth appears obvious when the world's population in 1800 and in 1900 are compared, 1,000 million and 2,000 million, respectively. If the figure is projected to the year 2,000, it becomes a startling 6,000 million.

TABLE I. GROWTH OF WORLD'S POPULATION

Year	People on Earth (Millions)
A.D. 1	250
1600	500
1800	1,000
1900	2,000
2000	6,000

Although such a thumbnail summary gives an overview of the world's population and heightens the universal interest in conception control, a couple seeking advice in a physician's office is not then especially interested in the problem of the world's population growth. They are, however, very much concerned about their ability to control the destiny of their own marriage. It is essential that proper methods of conception control be imparted to such a couple upon its request.

The physician-counselor must be aware that his recommendation in this matter, whether pill, diaphragm, condom, intrauterine device, or rhythm, must have flexibility and provide reassurance. Such advice cannot be given as a one-time, routine-type prescription. A single contraceptive agent cannot be advised for all time, for all couples; there is variation in acceptance as well as in usage. The physician's provision for a later opportunity to discuss the issues of conception control — a return visit some months later — is vital.

Rainwater's impressive data indicate that social and cultural backgrounds, to say nothing of personality characteristics, are major variables in successful, long-term control of conception.[2] Aside from these obvious considerations, there are numerous medical reasons supporting both the desire of an individual family to regulate its own size and the need for a more widespread community-type control. Such health-related reasons may be illustrated by two examples — the effect of the failure of child-spacing upon prematurity, one of the great remaining obstetric problems, and the relation of a lack of conception control to the societal burden of abortion.

PREMATURITY

The intense attention now being given to the complex problems associated with premature births needs no defense. Such low birthweight infants constitute 8 percent of those born almost everywhere in our country. However, it has not been appreciated until recently that close child-spacing is one of the causative factors of prematurity. The experience of our own institution indicates that the incidence of 8 percent applies only to the births occurring after more than a 23-month interval between pregnancies (Table II). It rises to 10 percent when that interval is reduced to between 12 and 23 months, and jumps to 18 percent when the time between the birth of children is less than 12 months. Obviously, much is to be gained by teaching women how to space their children.

TABLE II. RELATION OF CHILD-SPACING TO INCIDENCE OF PREMATURITY

Months Since Previous Pregnancy	Prematurity (Percentage of total births)
More than 23	7.8
12 to 23	10.3
Less than 12	18.0

SOCIAL ASPECTS OF REPRODUCTION

The emphasis given to the social aspects of pregnancy in the recent report of the WHO Committee on Maternal and Child Health cannot be overestimated.[3] The Committee urges that all countries take cognizance of the fact that better obstetric care requires improvement of social conditions. This pronouncement is in keeping with the cybernetics of animal populations, for it has been observed that overcrowding itself becomes a stimulus to population control. As Christian[4] writes, "No form of life can continue to multiply indefinitely without eventually coming to terms with the limitations of its environment." This not only applies to most married couples, but it serves also to emphasize the imperativeness of dealing with the abortion menace.

Studies continue to show that 25 percent of maternal deaths in the United States are caused by infected abortions.[5] The recent comprehensive study of long-term abortion trends carried out in New York City by the Department of Public Health[6] and the formation of the Association for the Study of Abortions[7] are obvious signs that this country is alerted to this matter. The present attempts to effect more meaningful abortion laws in both New York and California are being supported by countless physicians who resent being made hypocrites by present-day laws and who have identified a professional responsibility.

The most knotty problem in effecting the much-needed legislative action to bring about the proposed changes relates to the ultimate control of abortions performed for socio-economic circumstances alone. It is idle to suppose, as the recent statement by the Church of England underscores,[8] that the combined will of trained social workers and physicians will not prevail.

SUMMARY

Family life education, a portion of which is sex education, is a responsibility of many elements within a community, including its physicians. As a group, physicians are in the best position to impart the meaning of male and female sexuality. Physicians should, in addition, be involved in family as well as community decisions regarding such matters as conception control and the regulation of abortions.

REFERENCES

1. Steiger, W. A. "Is Science Basic?" *Journal of Medical Education*, 38, 768 (1963).
2. Rainwater, L. *And the Poor Get Children* (Chicago, 1960).
3. WHO Expert Committee on Maternal and Child Health, 4th Report. *Social Aspects in the Teaching of Obstetrics and Gynaecology*. Technical Report Series No. 266, World Health Organization (Geneva, 1963).
4. Christian, J. J. "Population Density and Social Pathology," *Endocrinology*, 74, 669 (1964).
5. Gold, E. M. "Observations on Abortion," *World Medical Journal*, 13, 76 (1966).
6. Gold, E. M., Erhardt, C. L., Jacobziner, H., and Nelson, F. G. "Therapeutic Abortion in New York City: A 20-Year Review." *American Journal of Public Health*, 55, 964 (1965).
7. Hall, R. E. "New York Abortion Law Survey." *American Journal of Obstetrics and Gynecology*, 93, 1182 (1965).
8. Report on Abortion. An Ethical Discussion. The Church Assembly's Board for Social Responsibility (London, 1965).

SCIENTIFIC ARTICLE

Flexor tendons in the hand severed in the region between the distal palmar crease and the proximal interphalangeal joint crease should be repaired by a secondary tendon graft. Also when a flexor tendon, cut at any level in the hand, has not been repaired within five weeks of injury, muscle shortening will occur necessitating a tendon graft operation.

Flexor Tendon Grafts In the Hand

BY WILLIAM C. GRABB, M.D.
REED O. DINGMAN, M.D.
ROBERT M. ONEAL, M.D.

It is a generally accepted principle that flexor tendons severed in the area between the distal palmar crease and the proximal interphalangeal joint crease of the hand, so aptly called "no-man's land" by Bunnell,[1] should be repaired by a secondary tendon graft. Severed tendons in other areas of the hand and severed nerves should generally be repaired primarily.

In no-man's land the flexor tendons pass through an osteo-fibrous tunnel, with the fibrous flexion sheath (digital sheath) on one side and the metacarpal and phalanges on the other (Figure 1). It is this fibrous flexion sheath which permits the tendon to pull around a corner and flex the finger. If tendon repair were to be carried out in this region, it has been shown clinically that it would be met with scarring between the osteo-fibrous tunnel and the tendon anastomosis, thus limiting the normal five- to eight-centimeter excursion of the flexor tendons. Therefore, the treatment of choice is to simply cleanse the wound, suture the skin laceration, and wait four to six weeks before placing a flexor tendon graft in the finger in such a way that its anastomoses are well away from the osteo-fibrous tunnel of no-man's land.

Though the treatment of choice in repairing tendons in no-man's land is secondary tendon

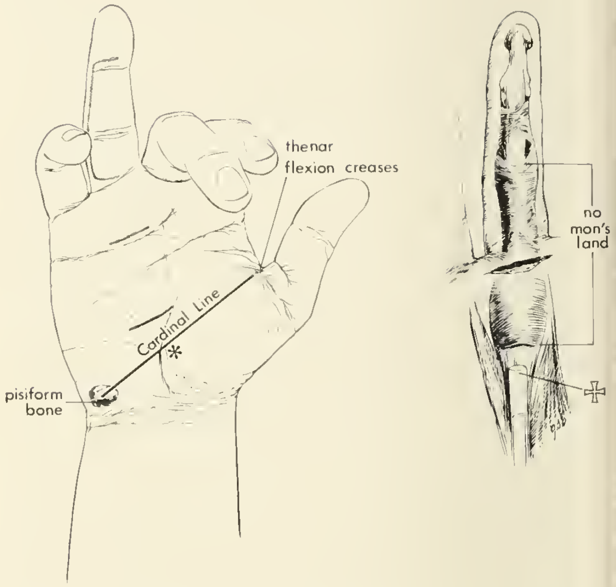


Figure 1. No-man's land extends for the length of the fibrous flexion sheath of the palm and finger, from the distal palmar crease to the proximal interphalangeal joint crease. The cut tendons retract only an inch or so, being held by the lumbrical muscle and vinculae.

The incisions in the hand for a flexor tendon graft include a mid-lateral incision in the finger and the two palmar incisions. The motor recurrent branch of the median nerve should be avoided. This nerve originates at the point where the cardinal line (between pisiform bone and thenar flexion crease) crosses the thenar crease. The nerve then passes superficially over the thenar musculature.

**From the Section of Plastic Surgery, Department of Surgery, University of Michigan School of Medicine and the Department of Plastic Surgery, St. Joseph Mercy Hospital, Ann Arbor.*

grafting, there is one exception to this rule. This exception is that in children under the age of four years the flexor digitorum profundus tendon can be successfully repaired primarily after resection of the flexor digitorum superficialis tendon and portions of the fibrous flexion sheath. Wakefield[2] has reported on 13 of these primary repairs which had about the same rate of success as secondary tendon grafts.

Some highly skilled surgeons have reported that in the ideal case, where there is a clean incised wound without injury to nerve or bone and operation can be carried out within a few hours of injury, primary repair of flexor tendons in no-man's land will give as good results as a secondary tendon graft.[3, 4, 5, 6] There are many other authorities who do not agree with this, and it is our opinion that for the vast majority of tendon injuries, the secondary tendon graft is the preferred treatment.[7, 8, 9, 10, 11]

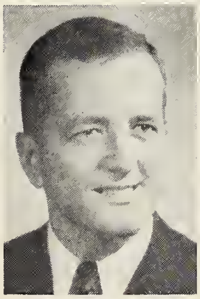
Indications for Flexor Tendon Grafting

The principal indication for carrying out a flexor tendon graft operation in the hand is for the treatment of severed flexor tendons in the region of no-man's land (Figure 1). Also severance of the flexor digitorum profundus tendon just distal (about 1 cm) to no-man's land should be repaired by a secondary tendon graft when the finger has been cut while in extension. This is due to the fact that the tendon repair would have to be made in no-man's land when the finger was held in moderate flexion during the healing period.

A flexor tendon graft may also be required in other areas of the hand or finger where the severed flexor tendons have not been repaired within four to five weeks of injury. After this much time the flexor muscle shortening is of such a degree that it is often not possible to bring the severed tendon ends together.

CO-AUTHORS

DINGMAN


GRABB

In the thumb, Verdan[12] is of the opinion that a flexor tendon graft is indicated for a tendon laceration at the level of the base of the thenar eminence where the long flexor emerges from the carpal canal changing its direction, and in the region of the first metacarpal head where the narrow osteo-fibrous tunnel will tend to become adherent to the tendon anastomosis. This opinion is not shared by all authorities. There is not a true region of no-man's land in the thumb.

Requirements for Operation

Good passive motion of the finger joints, a minimum of soft tissue scarring in the hand, and the presence of sensation in the finger or at least a good prospect of obtaining sensation are required

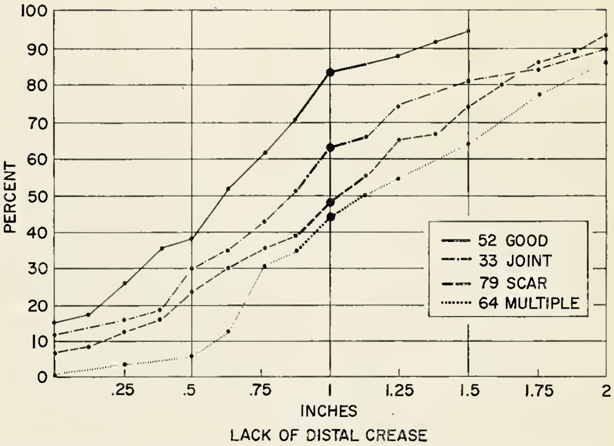


Figure 2. The results of tendon grafting are intimately related to the severity of the initial trauma to the hand. This chart summarizes Boyles[18] report on the results of 300 flexor tendon grafts. The final results are expressed as the number of inches the finger tip lacks of touching the distal palmar crease on active flexion, with 0 inches being normal. The "good" cases were ideal fingers with supple joints and without significant scarring. The "joint" cases comprised those fingers with limited passive motion which required mobilization by traction and active splinting before operation. The "scar" cases were made up of fingers with deep cicatrix. The "multiple" cases were those in which a graft was placed in more than one finger. Most of these "multiple" cases could also have been classified in the "scar" or "joint" categories.

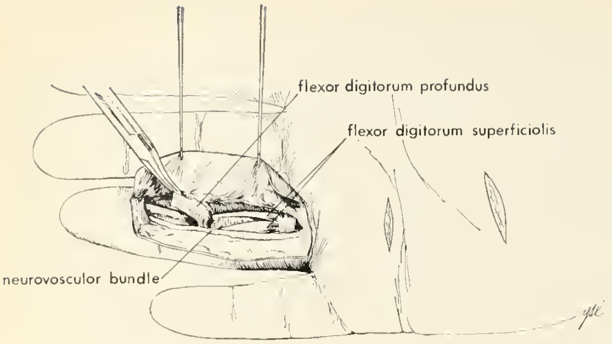


Figure 3. The technique of flexor tendon grafting is illustrated in this figure and those following. The flexor tendons are approached in the finger through a mid-lateral incision. raising a flap of skin and subcutaneous tissue and leaving the neurovascular bundle behind. All of the fibrous flexion sheath (digital sheath) is resected except for two, 5 mm-wide pulleys located at the midportion of the proximal and middle phalanges. The flexor profundus and superficialis tendons are removed from the finger.

in order to expect a satisfactory result from flexor tendon grafting. Boyes[4] has demonstrated very clearly that the results of tendon grafting are intimately related to the severity of the initial trauma to the hand. Figure 2 illustrates the detrimental effect of preoperative joint stiffness and deep scarring on the active flexion of the finger after tendon grafting.

When these optimum requirements are not present, flexor tendon grafting is still not precluded. For even if some active motion can be obtained especially in the thumb or when there are multiple digit injuries, the operation is worthwhile. When just one of the lesser fingers (index, middle, ring, or little) is involved and conditions are less than ideal, then grafting is not advised, and amputation of the finger should be strongly considered. McCormack, DeMuth, and Kindling,[13] in reporting on a series of flexor tendon grafts in the less than optimum situation, showed that in half of the cases, 50 percent of the possible passive joint motion at the proximal interphalangeal joints was obtained actively following the tendon graft, and at the distal interphalangeal joint the results were even poorer. Nevertheless, it was their opinion that the operation was worthwhile in the less than optimum situation, for otherwise the patient would have no active flexion at the interphalangeal joints.

The insertion of a silicone rod into the finger and hand along the course of the flexor profundus tendon has recently been utilized to form a false sheath of collagen. At a second operation three months later the silicone rod is removed and a traditional tendon graft inserted. This technique appears to have its greatest application where a tendon graft is needed in the less than optimum situation.[14, 15]

Source of Tendon Graft

The patient's own palmaris longus tendon and the middle three extensor digitorum longus tendons of the toes are the principle sources of tendons for grafting. Other tendons available are the plantaris, extensor indicis proprius, and the flexor digitorum superficialis from the injured finger in children. All of these tendons are functionally nonessential.[16]

The palmaris longus tendon is the best tendon to use as a flexor tendon graft because of its size, lack of fraying, and availability. It can be demonstrated by actively opposing the thumb and little finger and flexing the wrist (Figure 4). It is present in approximately 85 percent of people, but can be quite thin and thus unacceptable in some people.[17] When it is absent or thin in one arm, it is usually the same in the other arm. The palmaris longus tendon is usually removed through three transverse incisions (Figure 4) with its attached, thin, closely adherent layer of filmy tissue. Boyes[18] has demonstrated in a comparable series

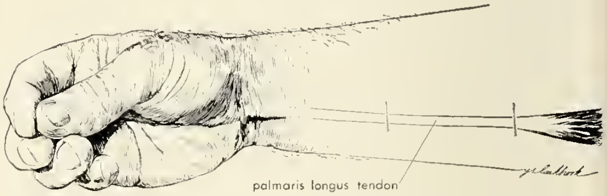


Figure 4. The palmaris longus tendon graft is removed through three transverse incisions, starting at the wrist. This tendon is present in 85 percent of people. Care must be taken to avoid injury to the median nerve which is just below the palmaris longus.

of tendon grafts that there is no definite indication for dissecting out the paratenon layer with the palmaris graft.

The extensor digitorum longus tendons of the toes are usually used for grafting when the palmaris longus tendons are absent or too thin, or multiple grafts are required. The middle three toe extensors are usually used as these toes also have short extensors which continue to provide toe extension. These flat tendons can be removed through one long incision starting just proximal to the base of the toe and extending to the lower border of the cruciform ligament at the ankle where the tendon can be pulled down and divided.

The plantaris tendon has all the good qualities of the palmaris for use as a graft, but, unfortunately it is also absent in those patients who do not have a palmaris tendon.[16]

While the extensor indicis propius tendon can be removed for use as a tendon graft, removal of the extensor digiti quinti will result in some degree of weakened extension at the fifth metacarpophalangeal joint.[16]

Zrubecky[19] has reported on the use of the flexor profundus tendon from an adjacent finger as a flexor tendon transfer. The adjacent finger profundus tendon is removed from its insertion, split longitudinally into equal parts back into the midpalm, and then one-half of the tendon is inserted in the recipient finger and the other half returned to the donor finger. In his report of 82 such operations, the donor finger regained its normal, active motion while the recipient finger attained approximately the same degree of active motion as might be expected from a traditional tendon graft.

Results of Flexor Tendon Grafting

In only 10 to 15 percent of patients who have had a secondary tendon graft for the treatment of severed flexor tendons in no-man's land can we expect complete active flexion of the finger into the palm.[7] It should be emphasized that a flexor tendon grafting operation is not likely to be followed by a return to completely normal function. Fortunately, if a patient is able to actively flex the finger to within 1 inch of the distal palmar crease of the palm, he can successfully accomplish most tasks. Peacock[7] has compiled the overall results of flexor tendon grafting reported by ten skilled hand surgeons; 40 to 60 percent of patients were able to actively flex within 1 inch of the palm. When the results of only the ideal cases were compiled, 30 to 40 percent were able to reach the palm and 90 to 100

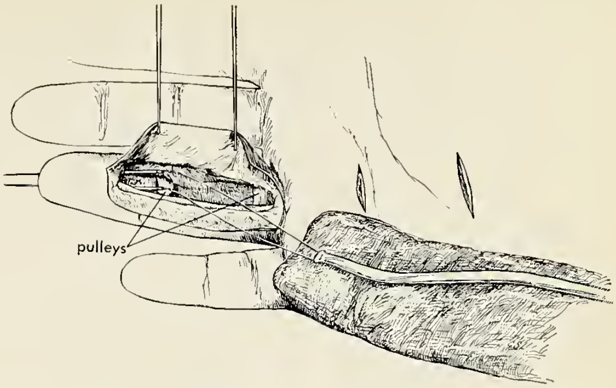


Figure 5. The tendon graft is attached to the distal phalanx by first using a 4 mm chisel to create a small notch in the bone. A number 32 stainless steel wire is then simply passed through the tendon near its end, two Keith needles are inserted in the bony notch and drilled through the phalanx to the fingernail, and the wires pulled through the bone and tied over a button on the fingernail.

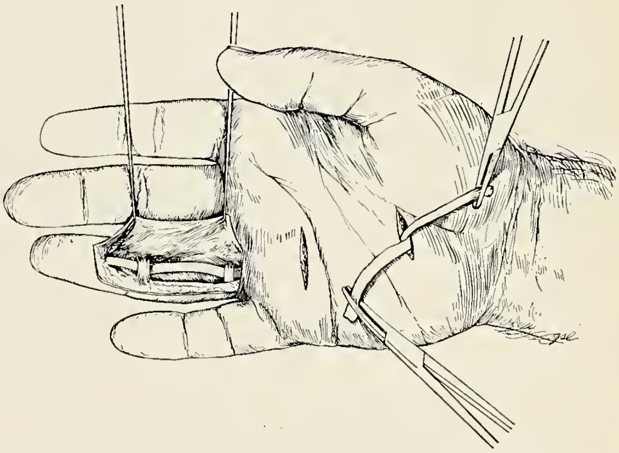


Figure 6. The tendon is passed beneath the pulleys in the finger and brought out in the proximal palm incision. The hemostats in this illustration are holding the tendon graft and the flexor digitorum profundus which can be identified by its lumbrical muscle attachment.

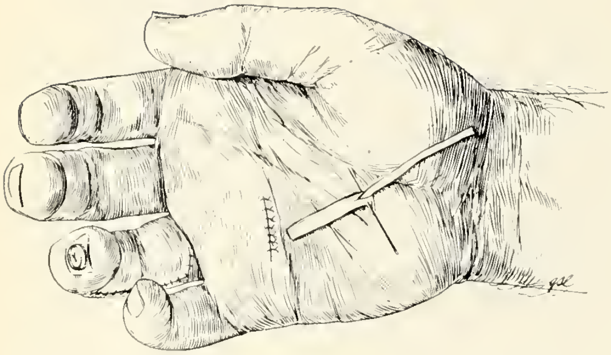


Figure 7. The skin incisions in the finger and distal palm are closed. With a number 11 knife blade an opening is made in the flexor profundus tendon at the level of the proximal palm. The tendon graft is inserted through this opening and both tendons are pulled so that the involved finger is definitely flexed more than the adjacent fingers. A needle is passed through both tendons to hold them while they are being sutured together with number 36 stainless steel wire.

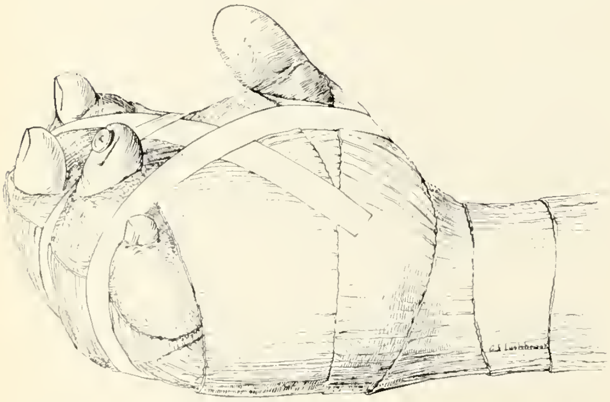


Figure 8. The hand is dressed in a bulky hand dressing and held in slight wrist flexion with a dorsal aluminum splint. This immobilization is maintained for 3½ weeks, before starting active and passive movement of the fingers.

percent were able to flex to within 1 inch of the palm.

Figure 2 illustrates the direct role that the severity of the initial trauma has on the results of flexor tendon grafting, with the more severely traumatized fingers having the poorest return of function.

The maximum function of the finger does not return for about one year postoperatively. During the first few months after operation, a continuous program of active and passive motion of the fingers should be carried out. This therapy is probably as important as the operation itself. Usually the physician can instruct the patient in this active and passive therapy, relying upon weekly office visits to encourage the patient and evaluate his progress. Some patients will also benefit by more frequent visits to the physical therapist.

Summary

Flexor tendons in the hand severed between the distal palmar crease and the proximal interphalangeal joint crease should be repaired by secondary tendon grafting in most instances. The palmaris longus tendon is the best tendon to utilize for a tendon graft.

The overall results of flexor tendon grafting in a large number of reported cases reveal that 40 to 60 percent of patients were able to flex their fingers to within 1 inch of the distal palmar crease. In the ideal cases, where there were supple joints and there was minimal scarring of the soft tissues, 90 to 100 percent of patients were able to flex their fingers wthin 1 inch of the palm.

References

1. Bunnell, S. Repair of Tendons in the Fingers and Description of Two New Instruments, *Surgery, Gynecology and Obstetrics*, XXVI, 103 (1918).
2. Wakefield, A. R. Hand Injuries in Children, *Journal of Bone and Joint Surgery*, XLVI, 1226 (1964).
3. Verdan, C. Primary Repair of Flexor Tendons, *Journal of Bone and Joint Surgery*, XLIII, 647 (1960).
4. Siler, V. E. Primary Tenorrhaphy and Neurorrhaphy of the Hand and Forearm, *American Journal of Surgery*, LXXX, 772 (1950).
5. Mason, M. L. The Treatment of Open Injuries to the Hand with Particular Reference to Tendon Repair, *Postgraduate Medicine*, XXII, 157 (1957).
6. Koch, S. L. Division of the Flexor Tendons within the Digital Sheaths, *Surgery, Gynecology and Obstetrics*, IX, 78 (1944).

7. Peacock, E. E., and Hurtrampf, C. R. The Repair of Flexor Tendons in the Hand, *Surgery, Gynecology and Obstetrics,* CXIII, 411 (1961).

8. Littler, J. W. Free Tendon Grafts in Secondary Flexor Tendon Repair, *American Journal of Surgery,* LXXIV, 315 (1947).

9. Boyes, J. H. Why Tendon Repair? *Journal of Bone and Joint Surgery,* XLI-A, 577 (1959).

10. Posch, J. L. Secondary Tenorrhaphies and Tendon Grafts in Injuries to the Hand, *American Journal of Surgery,* LXXXV, 306 (1953).

11. Kelly, A. P. Primary Tendon Repairs. A Study of 789 Consecutive Tendon Severances, *Journal of Bone and Joint Surgery,* XLI-A, 581 (1959).

12. Verdan, C. Practical Considerations for Primary and Secondary Repair of Tendon Injuries, *Surgical Clinics of North America,* XLIV, 951 (1964).

13. McCormack, R. M., DeMuth, R. J., and Kindling, P. H. Flexor Tendon Grafts in the Less-Than-Optimum Situation, *Journal of Bone and Joint Surgery,* XLIV-A 1360 (1962).

14. Gaisford, J. C., Harma, D. C., and Richardson, G. S. Tendon Grafting: A Suggested Technique, *Plastic and Reconstructive Surgery,* XXXVIII, 302 (1966).

15. Hunter, J. Artifical Tendons, Early Development and Application, *American Journal of Surgery,* CIX, 325 (1965).

16. White, W. L. Tendon Grafts: A Consideration of Their Source, Procurement and Suitability, *Surgical Clinics of North America,* XL, ii, 403 (1960).

17. Reimann, A. F., Daseler, E. H., Anson, B. J., and Beaton, L. E. The Palmaris Longus Muscle and Tendon: A Study of 1600 Extremities, *Anatomical Record,* LXXXIX, 495 (1944).

18. Boyes, J. H. Evaluation of Results of Digital Flexor Tendon Grafts, *American Journal of Surgery,* LXXXIX, 1116 (1955).

19. Zrubecky, G. Kritische Austerwertung von 82 Freien Beugesehnenplastiken and den Fingern, *Verhandlungen Deutschen Orthopädischen Gesellschaft,* 48 Kongress (October 1960).

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MSMS ANNUAL SESSION, SEPT. 27-28-29

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House of Delegates, Sept. 24-25-26

Treatment of acute alcohol withdrawal has been empirical, unreliable, and often disastrous. For this reason necessary treatment of a serious medical emergency has been denied a large segment of the population. New insights make treatment of this condition rational and predictable. These methods make acute alcohol withdrawal worthy of reconsideration as a condition well within the capabilities of every physician.

Michigan Medicine's Forgotten Man?

BY RUSSELL F. SMITH, M.D.

It is a sobering thought, at first, to realize that there still exists a second-class citizen in a medically sophisticated state like Michigan. The object of this discrimination, the alcoholic, finds it difficult to obtain help even in this day of kidney transplants and open heart surgery because his disease is so poorly understood and therapeutic success is so infrequent. Physicians have long salved their consciences with the fact that there are institutions in Michigan devoted to the care of the alcoholic. These available beds are pitifully few and the waiting lists are painfully long. Michigan's quarter of a million known alcoholics are asking for help, help which is not available. The alcoholic, his family, and those affected by his problem must satisfy themselves with patchwork assistance, failure, and final dissillusionment.

We have traditionally ignored our medical responsibilities to the alcoholic with the excuse that

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he could best be helped by someone else. It never occurred to us that the uncooperative, resistive, often hostile alcoholic might respect us more and cooperate more fully if we demonstrated even a rudimentary knowledge of his disease. This major step forward will be difficult since, at present, we physicians are not clear about the responsibility for care of the acute alcoholic. Certainly in advanced cirrhosis, esophageal varices, or hepatic coma we admit responsibility and the existence of medical disease. Much earlier in alcoholism, when life, liver, and brain are salvagable, the issue of medical responsibility is not so clear-cut. Our present scapegoat, the psychiatrist, is left alone to treat acute alcohol withdrawal. We, through our indifference, place him in the unenviable position of treating a condition that kills one in 20. Our most poorly equipped colleagues from the standpoint of special training or experience, are left to cope with the metabolic chaos, infections, and other purely medical problems of withdrawal. Left stranded to wrestle with these medical problems by default, psychiatrists become rapidly disillusioned. It really is no surprise to find that the majority of them refuse to treat alcoholics at all, rather than be placed in such a position.

THE AUTHOR
DOCTOR SMITH

Hospital doors have long been closed to the alcoholic. His reputation as an unruly, difficult, noisy patient is widespread. Factors causing the alcoholic to be such a difficult in-patient may originate with us and not with the alcoholic himself. This is another disquieting prospect. Could it be that our own poor management of this condition makes the alcoholic such a problem within the hospital? If true, this would mean a quarter-of-a-million Michigan residents are being denied much-needed medical care and hospitalization because of circumstances we physicians have created. Alcoholics may all too often survive withdrawal in spite of, rather than because of, their treatment.

Existing information makes possible a rational approach to the acute alcoholic episode. Recent insights into the chemical dynamics of intoxication are beginning to define a logical division of labor in dealing with the total problem of alcoholism. The demonstration of alcohol dehydrogenase, the enzyme responsible for oxidation and degradation of alcohol, points up variations in individual capacities to metabolize alcohol. More recent studies suggest that the enzyme is an important factor in the production of alcoholic cirrhosis. The demonstration of consistent neurohormonal responses during drinking episodes also points to significant group variation. Measurements of neurohormone metabolism during alcohol intoxication and withdrawal point to a previously unsuspected, net antidepressant effect in the alcoholism-prone group. With these two keys we are beginning to unlock the mysteries of the unique type of intoxication and withdrawal experienced by alcoholics.

The initial rise in blood alcohol results from intake exceeding the liver's alcohol dehydrogenase capacity. During this rise we see the classical symptoms of alcohol intoxication. These symptoms occur because of alcohol's histotoxic effect, which reduces oxygen consumption of cells, particularly in the reticular area of the brain. Concurrently, alcohol exhausts all available neurohormones. The cerebral vascular bed constricts, accentuating the existing oxygen starvation in response to reduced histamine. Norephinephrine and acetylcholine deficiency decrease general excitability, alertness, and coordinated thought and movement. Temperature, pulse, blood pressure, and gastrointestinal motility are slowed or reduced because of diminished available serotonin. Through these mechanisms alcohol initially produces generalized central nervous system depression in the traditional sense.

If alcohol intake continues at a constant rate over an extended period of time, the body response breaks tradition. Prolonged alcohol intake is encouraged in individuals with high levels of liver alcohol dehydrogenase. The alcoholism-prone group are initially able to metabolize greater quantities of alcohol over longer periods of time. They can drink their companions under the table. If this potential for prolonged alcohol use is realized, some totally unexpected metabolic changes occur. The brain, in an attempt to accommodate to this alcohol environment, moves to restore neurhormonal balance. Histamine levels rise, opening the cerebral vascular beds to compensate for the oxygen shortage. Acetylcholine and norepinephine levels rise somewhat more slowly in an attempt to restore cortical alertness. Serotonin levels follow in an attempt to balance acetylcholine excess. The unusual persistence of the serotonin rise may be due to the monamine oxidase inhibitor effects of histamine or of M. A. O. inhibitor effects of intermediate metabolites of unoxidized alcohol and glucose. These compensating changes in cerebral metabolism result in increased alertness and an antidepressant effect as long as alcohol intake and destruction remain at constant levels. In this manner the brain attempts to restore neurohormonal homeostasis, the net result allowing the alcoholic to be able to drink himself apparently sober.

The plateau of apparent sobriety that occurs with balance between alcohol intake and degradation explains many previously strange phenomena observed in alcoholics. Recent investigatons indicate a clear possibility of two distinct forms of alcohol intoxication. One is the long-recognized and far more common progressive loss of control and coordinated movement. This type leaves the subject feeling helpless, lost, and out of control, an experience certainly not worth repeating. The second response is that of exhilaration, freedom, and near omnipotence seen in those individuals whose antidepressant response and central nervous system's compensating mechanisms are rapid and more highly developed. The latter experience is pleasurable and would encourage repetition. The unique plateau between sedation and antidepression would appear to be the state the alcoholic seeks. Initially the alcoholic can work, drive, and carry out his daily duties without obvious impairment from his drinking, all the while experiencing feelings of confidence, power, and false ease.

Inevitably this biochemical honeymoon must end in either imbalance or cessation of drinking. This brings us to the villain of our peace, alcohol withdrawal. As the blood alcohol falls, the mixed blessing of increased tolerance becomes the instrument of the alcoholic's downfall. His withdrawal is precipitously rapid because of his higher levels of alcohol dehydrogenase. This rapid change follows the same principles we experience in changing serum electrolites, blood sugar, or hemoglobin, and results in metabolic chaos. As the blood-alcohol level drops, the acetylcholine level continues unopposed, resulting in a brief period of uninhibited excitation that can precipitate seizures. This is somewhat like having one foot on the car accelerator the other on the brake, then releasing the brake. The serotonin level continues to rise due to the fall in acetylcholine and the lack of destruction owing to the persistence of histamines and other monamine oxidase inhibitor effects. The persisting serotonin rise has been confirmed by metabolic studies and is the primary culprit in alcohol withdrawal. The symptoms of serotonin excess are listed as seizures, increase of blood pressure and pulse, disturbances of ocular motility, muscle tremors, mental confusion, and hallucinations. One could find no better description of delirium tremens.

This brief description of the biochemical dynamics of the drinking episode clearly points to areas needing treatment during withdrawal. First, an effective anticonvulsant must be administered. Second, the high level of serotonin must be reduced. Third, further production of serotonin must be blocked. Fourth, neurohormonal balance must be restored in a controlled, orderly fashion. Lastly, other clinically indicated supportive measures should be taken. With these insights the treatment of acute alcohol withdrawal can be based on well-defined clinical goals. The choice of therapeutic agents can now be made according to clear-cut pharmacological performance instead of the educated guesswork necessary in the past.

The development of satisfactory therapeutic agents has occurred parallel to our increased understanding of the acute alcoholic episode. This circumstance is responsible for the enviable and infrequent medical situation that now exists. As we have arrived at a significant understanding of the clinical problem of acute alcoholism, we find the necssary therapeutic armamentarium already at hand. The first two clinical goals necessary are an agent capable of controlling withdrawal seizures and one that can effectively reduce neurohormone levels. An extremely effective agent in both of these areas is known and has been used empirically for several years. The agent, Primidone, was an American development, yet it's effectiveness was demonstrated in Toronto, Canada, by Doctor Gordon Bell.[8] As a close chemical relative of phenobarbital, Primidone* effectively lowers serotonin levels. In addition, it is a highly effective anticonvulsant objectively shown to have some 100 times the electrical protection of the Hydantoins and 2½ times Hydantoin's effectiveness against chemical stimulation. In local areas where it is used, rum fits have virtually disappeared. Alternative methods of reducing high serotonin levels are the administration of Barbiturates, Reserpine, or alcohol itself. In first-aid situations perhaps alcohol is the most satisfactory agent since it is familiar to laymen and the alcoholic. Barbiturates and Reserpine although effective, carry the risks of oversedation, paradoxical response with agitation, or cross dependency with substitution of a new problem for the old.

To block further neurohormone production we have effective agents in the phenothiozines. Present day studies with less effective and purely sedative drugs seem somewhat superfluous and ill-conceived. It is difficult to improve on near perfection. The choice of phenothiazine does, however, deserve some consideration. The oldest member of this group is Chlorpromazine,** which when it was all we had, proved highly effective and relatively trouble-free. Jaundice does occasionally occur, obscuring a condition where it has many other prognostic implications. For short-term use, as occurs in alcohol withdrawal, it would seem that there are no clear-cut contraindications other than individual experience and consideration. Second on the scene was Promazine H.C.L.*** Although effective in depressing neurohormone levels, the difficulties encountered with postural hypotension and seizures make it less than desirable for use in withdrawal. A relative newcomer in this rapidly enlarging family is Thioridazine.**** This agent performs well in reducing serotonin levels without the theoretical hazards of Chlorpromazine or the real difficulties encountered with Promazine H.C.L. In over five years of personal use we have observed no serious side effects. The one commonly observed secondary activity, that of an atropine, like dry mouth, has actually proven to be an asset since it promotes oral fluid intake in dehydrated patients.

With this general goal in the therapy of withdrawal, we can establish clinical criteria for measuring the effectiveness of treatment. Many years of observation have demonstrated a clearly reproducible timetable for alcohol withdrawal. Withdrawal begins somewhere between four and 12 hours, builds to its maximum in 72 hours, and subsides over the next 48 to 72 hours. During the rise and fall of withdrawal intensity, the blood pressure, pulse, and extraocular movements give a clear picture of the patient's status and the effectiveness of treatment, even without history or patient cooperation. The mean pulse curve ranges from 90 to 110 beats per minute in 24 hours, to 100 to 140 per minute in 72 hours. Blood pressures commonly show a rise of 30 to 40 mm of mercury in both systolic and diastolic pressure in 24 hours. At the peak of withdrawal an elevation of 60 to 80 mm of mercury is not uncommon. The eye signs of withdrawal are, characteristically, a horizontal positional nystagmus occurring with lateral gaze. These eye findings range from mild, induced nystagmus, spontaneously occurring nystagmus at

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*Mysoline, Ayrest

**Thorazine S.K.F.

***Sparine Wyeth

****Mellaril, Sandoz

72 hours, to actual paralysis of lateral gaze in advanced withdrawal. Finding blood pressure, pulse, and eye changes described above, rising and falling with a 72-hour peak, is pathognomonic of clinical alcoholism. These findings are the most objective and reliable method of diagnosing this disorder, history not withstanding.

Our ultimate goal in withdrawal management is to titrate the intake of the neurohormone blocking agent in such a way as to keep blood pressure and pulse at the 24-hour level. If this is not possible, we can still successfully handle the situation if we slow and restrict the amount of metabolic change. The importance of gradual change in any area of body metabolism from glucose to electrolites is firmly established and respected by all physicians. Primidone (mysoline) must be given early in rather large does to prevent seizures and lower accumulated serotonin levels. An initial dosage of 250 mg four times a day is adequate. It is unwise and ineffective to use mysoline as the titration agent since this would be like emptying a barrel without turning off the filling hose. It is safe to taper the dose of mysoline after the third-day peak in treatment. The drug of choice in controlling serotonin levels during withdrawal are those which effectively block its production. This brings us to the use of phenothizines. With the available clinical guidelines the therapist need not be fearful or timid in their use. Initial doses of 100 to 150 mg four times a day are not uncommon. By the third day doses of 150 to 300 mg q.i.d. are usual. If these techniques fail and delirium tremens appear imminent or occur, all is not lost. One simply has to reinstitute a state of intoxication and begin again. This will exhaust the stores of neurohormones to a point where therapy can begin on a known basis. Our choice over the years has been sodium luminal because of its (theoretical) increased renal and decreased hepatic excretion. Alcohol, barbiturates, or other related drugs would suffice. Doses of 1,000 to 2,000 mg of luminal are often necessary. These agents can be given intravenously at a slow rate until the patient is in a quiet sleep. An alternative method is to give 500 mg with additional 200 mg each hour until sleep occurs.

Our goal in this brief and very superficial discussion has been to point out that acute alcohol withdrawal is not the mystery that we credit it. The biochemical and metabolic changes involved are being understood and proven. As the body reesponds to an abnormal environment, the emerging picture is dynamic and changing. Such a picture is identical to that seen in all other forms of natural or induced metabolic disease. As such, once understood, it is readily comprehended by the well-trained physician. Once the mechanisms are selected, the treatment of this medical emergency becomes rational. The clinical yardsticks for measuring patient status are readily obtained and are easily followed. It seems almost self-evident that the treatment of this condition lies within the competence of any trained physician. And such treatment is not dissimilar to the skills we use daily in treating hundreds of other medical crises, from vascular shock to diabetic accidosis. Continued pratice increases skill to the point where delerium tremens only rarely occurs and is quickly controlled if it does. Once mastered, these techniques can make possible the management of many withdrawals without hospitalization and can eliminate any valid objections to hospitalization of the acute alcoholic. Widespread use of available knowledge and tools of therapy where all other necessary medical therapy is readily at hand can reduce the apalling death rate now recorded. Furthermore, it can raise the level of care for the acute alcoholic to that provided for any other acutely ill group. If, as physicians, we can forget our fear of the unknown and use the information now at hand, the alcoholic can soon cease to be our last second-class medical citizen.

References

1. Von Wortburg, J. P., Vallee, B. L., and Bethine, J. L. First Enzyme from Human Liver, *Proceedings, 145th Annual Meeting, American Chemical Society*, 1963.
2. Harris, I. *Structure and Catalytic Activity of Alcohol Dehydrogenase, Nature*, CCIII, 30-40 (1964).
3. Cirrhosis Traced to Breakdown in Oxidation of Alcohol, *Medical World News*, VII, 130-131 (November 4, 1966).
4. Udenfriend, S., Weissbach, H., and Bogdonski, D. F. Effects of 5-Hydroxytroptophere in the Dog, *Annals, New York Academy of Science*, LXVI, 602 (1957).
5. Maynard, L. S., and Schender, V. J. *Monamine Oxidase Inhabition by Ethanol in Vitro, Nature*, CXCVI, 575-576 (1962).
6. Dajoni, R. M., Danielchi, J., and Orten, J. M. The Alcohol-Acetaldehyde Dehydrogenase Systems in the Livers of Alcohol Treated Rats, *Journal of Nutrition*, LXXX, 196-204 (1963).
7. Braceland, F. J. *The Effect of Pharmacological Agents on the Nervous System* (Baltimore, 1959).
8. Personal communications.

USE OF THIORIDAZINE

BY W. G. BROVINS, M.D.
J. WIERZBICKI, M.D.

The rapid increase in the number of elderly patients entering mental institutions has forced the state hospitals to develop more intensive treatment programs on their geriatric services, programs designed to cope with physical as well as behavioral disorders. Behavior disorders can be controlled effectively with the phenothiazines, but side reactions may limit their usefulness since they are apt to occur with greater frequency and severity in the aged than in younger patients.[1] The aged brain has been described as being more sensitive to the pharmacologic action of these drugs,[1] suggesting the need for an agent exerting an adequate tranquilizing effect without generating excessive side effects.

Reports[2-4] have indicated that thioridazine demonstrates such properties in geriatric patients. Since previous studies have been confined to chronic patients, it was deemed useful to undertake an evaluation of thioridazine on a service geared toward rehabilitation and discharge, rather than custodial care.

About five patients are admitted weekly on the geriatric admissions service of this hospital,* many presenting a combination of behavior problems and acute or chronic physical illness. Treatment is aimed at returning as many as possible to the community within a short time. This report presents an evaluation of thioridazine in 80 newly admitted patients, aged 60 to 95 years, conducted over a period of eight months. Chronic brain syndrome was the diagnosis in 46 patients and various psychotic disorders in 34 patients. In addition, most patients suffered from a variety of physical conditions including arteriosclerotic heart disease, diabetes mellitus, and tuberculosis. Other complications included malnutrition, dehydration, and poor kidney function.

No serious toxic complications were observed with thioridazine during the course of our study. In several patients who exhibited mild drowsiness or dryness of the mouth these effects tended to disappear spontaneously in two or three days without special treatment. No extrapyramidal symptoms were observed. We were able to minimize the problem of postural hypotension by starting with small doses and, if necessary, by keeping the patient in a supine position for 48 hours.

Treatment was usually begun with 25 mg thioridazine two or three times a day. In some of the older patients we employed an even smaller dose, sometimes as low as 10 mg thioridazine t.i.d. This dose was increased in small increments over a period of days until the desired therapeutic effect was obtained. In most patients the dose was 75-150 mg thioridazine daily, but some of the more severely disturbed patients required as much as 200-300 mg per day. Even in the most disturbed group, a good therapeutic effect was usually observed within the first two weeks of treatment. During the first day or two of treatment, we took blood pressures once or twice daily to guard against the possibility of the orthostatic hypotension, which the aged are more prone to exhibit.

Results

Thirty-two patients (40 percent) showed sufficient remission to permit their discharge to the care of their families or a nursing home. A marked reduction in aggressiveness was obtained in another 30 patients (37 percent). Improvement in socialization enabled them to adjust well in an open ward or in a closed ward where ground privileges

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*Ypsilanti State Hospital, Ypsilanti, Michigan were permitted. Slight improvement was noted in 16 patients (20 percent) who became more manageable and able to perform light ward duties. Several patients who previously had been incontinent exhibited better personal hygiene. Two patients refused oral medication and had to be switched to an injectable phenothiazine.

Reduction in the major target symptoms, agitation and disorientation, was obtained quite readily, usually within the first two weeks of treatment. Remission was achieved in many patients with small doses of thioridazine, as illustrated in the following case reports:

Mr. L. M., a divorced, retired lawyer, age 72 years, was admitted on December 29, 1965. He was extremely agitated and aggressive and was so uncooperative and hostile that it was not even possible to perform a routine physical examination. In addition, he was incoherent, disoriented, and represented a feeding problem. Two weeks after thioridazine was begun in a dose of 25 mg three times a day, he became more cooperative, his agitation and aggressiveness disappeared, and he accepted food. He was placed on convalescent status in a home on February 22, 1966, and was discharged by the court on March 3.

Miss A. T., age 75 years, was admitted September 30, 1965, with symptoms of agitation, disorientation, incoherence, delusions of being cremated, and hallucinations. She was anoretic, undernourished, and nearly cachectic. With thioridazine 10 mg three times a day, she became more coherent and sociable, her hallucinations and delusions disappeared, and she presented no further problem in management. She was placed on convalescent status on November 17 and returned to her family. On November 21, she was discharged by the court.

As indicated above, most patients presented physical illness as well and were receiving many drugs, the most common being chlorothiazide, digitalis, isoniazid, aminosalicylic acid, insulin, and antibiotics. No incompatibility or adverse effects were noted when thioridazine was administered to patients receiving these drugs.

Discussion

Intensive treatment that will permit discharge can be as essential for the elderly psychiatric patient as for the younger mental hospital patient. The use of thioridazine has been an indispensible feature of the active treatment program described here through its effective control of malbehavior. A similar effect has been reported[1] in the custodial type of geriatric population where patients taking thioridazine were found to take a greater interest in fellow inmates and surroundings instead of ruminating and "looking inward."

The use of small starting doses with gradual adjustment being made according to individual patient response virtually eliminated excessive sedation and hypotension and enabled each patient to gain maximum therapeutic benefit. No extrapyramidal symptoms were observed. This is in agreement with the estimate of Hader[5] that thioridazine ". . . is a valuable, usually non-Parkinson producing drug. . .," but is in sharp contrast to the generalization that "Fifty percent of all patients between 60 and 80 years of age receiving phenothiazines develop extrapyramidal side reactions."[1] When possible, patients have been encouraged to continue thioridazine on an outpatient basis after hospital discharge or transfer to nursing homes.

Summary

An evaluation of thioridazine in 80 newly admitted patients on an active geriatric treatment service showed that 32 patients realized sufficient remission to return to the community, and 30 achieved substantial improvement in behavior though they remained in the hospital. Thioridazine was well tolerated, even when administered to patients receiving other drugs for concomitant physical illness. Side effects were minimized by starting with small doses and increasing gradually as required.

Conclusion

Thioridazine was found to be a useful drug for the psychiatric disorders of geriatric patients. Its effect was demonstrated in the increased hospital discharges or in the marked symptomatic improvement obtained in a majority of the patients in this series.

References

1. Hamilton, L. D. Aged Brain and the Phenothiazines, *Geriatrics,* XXI, 131-138 (May 1966).
2. Kral, V. A. The Use of Thioridazine (Mellaril) in Aged People, *Canadian Medical Association Journal,* LXXXIV, 152-154 (January 21, 1961).
3. Jackson, E. B. Mellaril in the Treatment of the Geriatric Patient, *American Journal of Psychiatry,* CXVIII, 543-544 (December 1961).
4. Cavero, C. V. Evaluation of Thioridazine in the Aged, *Journal of the American Geriatrics Society,* XIV, 617-622 (June 1966).
5. Hader, M. The Use of Selected Phenothiazines in Elderly Patients: A Review, *Journal of the Mount Sinai Hospital,* New York, XXXII, 622-633 (1965).

Recalls 1881 Attempts to Begin Medical Diploma Mill in Michigan

BY PETER HOHEISEL
OF THE MSMS STAFF

Behind the stacks at the General Library of Wayne State University is the office of Leslie Hanawalt, Ph.D., now working on a history of Wayne State University to be published in the fall of 1967. Doctor Hanawalt, in his studies, has learned much about the history of medical education. The following interview contains some of his observations about the history of medicine in the nineteenth century.

Interviewer: Doctor Hanawalt, what have been the key legislative acts affecting medicine in Michigan?

Doctor Hanawalt: In 1899 the Chandler Act began the first real state control of medicine. This act set up a state board of licensing and registration. During most of the nineteenth century no state in the Union had real boards of registration.

Interviewer: What was the reason for this?

Doctor Hanawalt: Partly because it wasn't until the 1880's that medicine began to be an effective science — that is, able to differentiate between diseases and get at real causes and real remedies. Until the 1880's medical science was not extensive and refined enough to be really useful in curing patients. Of course, basic anatomy was known long before then, but the big change came when Pasteur and Robert Koch, in the late nineteenth century, made their discoveries. Pasteur found that bacteria definitely caused some diseases. Befor him this was not known. Until then the different theories, for example, the humeral theory, assumed that if a person got sick, something was wrong with his whole body. The idea that an organ could be diseased and others not was unknown. You see, if you assumed that the disease was in the whole body, the idea would be to get it out of the body. Hence, the practice of bloodletting and purging. In fact, George Washington probably died from bloodletting. All this was fittingly called "heroic medicine." Some people, of course, got well in spite of all this bloodletting and purging. If he got well, it was because of the doctor, and if he died, it was God's will.

Interviewer: What was medicine like, in general, in the nineteenth century?

Doctor Hanawalt: The most striking thing was the many medical sects at that time. Homeopaths, ecletics, Thompsonians, botanicals, and herbalists. The homeopath was interesting. His doctrine was that "like cures like." For example, a medicine made from a leaf shaped like a heart would be used to treat heart disease. The homeopath believed in giving these medicines in small doses. The people liked homeopaths, and botanicals, because they didn't purge you, vomit you, or bleed you to death. They just put you to bed with an ice pack and gave you minute doses of their medicine. It was really difficult in the nineteenth century to tell the difference between a good doctor and a bad doctor. I suppose a good doctor was one who didn't harm you too much.

Interviewer: Earlier, Doctor Hanawalt, you mentioned the work of Koch. What did he do?

Doctor Hanawalt: Koch refined the work of Pasteur. In 1882 he established the procedures by which you can state that a given germ causes a given disease.

Interviewer: Really then, it wasn't until the late nineteenth century that things began to get organized in medicine, was it?

Doctor Hanawalt: No, it wasn't. Before you had the different sects, which I mentioned, fighting to prevent legislation from standardizing medical practice, but into this chaos came the work of Pasteur and Koch and Lister, in England.

Interviewer: What did Lister do?

Doctor Hanawalt: He was a surgeon, but in those days the worst hazard of surgery wasn't shock, but the danger of infection. Lister thought that whatever caused infection was in the air. Hence, he developed antiseptic dressings to try to shut out whatever was causing infection, thereby making surgery safer. That was his big contribution.

Interviewer: Anyone here in Detroit doing anything similar at that time or advancing medicine in any way?

Doctor Hanawalt: Yes, Doctor Theodore A. McGraw was practicing Lister's methods before 1880 here in Detroit. He was also a chief founder of the Medical School at Wayne. I can't stress too much how important these discoveries were in the 1880's, the 1890's. When diseases were identified, and the germs which caused them pinpointed, then you could develop vaccines and antitoxins to deal with them. The 1880's and 1890's were really a time of revelation in the field of medicine.

Interviewer: Were there any original contributions over here in the nineteenth century? All the men you mentioned have been Europeans.

Doctor Hanawalt: No, there really weren't. Not much early research was done in this country. One reason for that was that in Europe, medicine and research and education were being subsidized. It took us a long time to get around to the idea that the public would educate someone who was going to make his living at the profession he was being educated for. At the time of the Civil War, for example, no medical school was publicly supported. Even as late as 1900, professors of medicine were still expected to earn most of their living in private practice. We didn't really, therefore, contribute much original research. We did, however, have the good sense to accept very quickly the discoveries made in Europe.

Interviewer: When did the states finally get around to supporting medical schools?

Doctor Hanawalt: Around 1900, actually.

LESLIE HANAWALT, PH.D., W.S.U.

Interviewer: Could you say something about the history of medical education here in Detroit?

Doctor Hanawalt: The year 1868 saw the opening of the Detroit Medical College, which was the forerunner of Wayne State's present School of Medicine. I guess you could say that is when formal medical education started in Detroit. It was started by a group of Detroit doctors; they had to pay for everything. There were only two hospitals in Detroit — St. Mary's and Harper. The Detroit Medical College was right next to Harper Hospital. In 1879 another college sprang up called the Michigan College of Medicine. This wasn't unusual at the time, incidentally. In 1900 the State of Michigan had seven medical schools. By 1912, of those seven colleges there were only two regular medical schools left, as there are now. This was going on all over the country. In 1900 there were 160 or 170 medical schools in the nation. Now we have 80.

Interviewer: What was the strong point of the old Detroit Medical College?

Doctor Hanawalt: It excelled from the beginning in clinical work because of its connection with the two hospitals. Then the Detroit College of Medicine also became affiliated with Grace Hospital, in the late nineteenth century, and with Women's Hospital. This made it stronger than ever.

Interviewer: Why do we have fewer medical schools now?

Doctor Hanawalt: What killed off the private medical schools was the growth of laboratory sciences. One hundred years ago there were two basic lab sciences — anatomy and chemistry. After 1890 there were eight or nine lab sciences. You see, in the nineteenth century, private medical schools could survive because practitioners donated their services. As I mentioned before, teachers were supposed to get their main support from their private practices.

Interviewer: Can you think of anything that distinguished Michigan's medical schools from those of others around the country?

Doctor Hanawalt: Not directly. There is one curious thing, though. Michigan has never had "quack" schools. Before 1900 there were a lot of diploma mills throughout the country. Chicago, especially, had a lot of them. In 1881 we almost had one. A fellow by the name of Buchanan ran a chain of diploma mills throughout the country. He sent an agent here to Detroit, but the newspapers got a hold of it and began to run it down. A lot of cloak-and-dagger stuff went on. The whole idea was finally killed.

DETROIT MEDICAL COLLEGE

Interviewer: You mentioned before, Doctor Hanawalt, that the public was reluctant, in the past, to finance medical education. Why the change?

Doctor Hanawalt: You must remember that the period from 1890 to World War I was a progressive period in our history. Child labor laws were enacted. The Pure Food and Drug Act was established. The meat packers were regulated. The muckrakers got at the oil trusts. In these 25 years the idea of public control of things developed. During this period the people began to feel that for their own good there must be some public control of enterprise.

Interviewer: This must have affected medicine, didn't it?

Doctor Hanawalt: Yes, of course it did. The public began to feel a responsibility for the medical schools. Another thing which helped to change the public conscience toward its responsibility to medical training was all the scientific discoveries. The better science got, the more people wanted well-trained men.

Interviewer: To shift the discussion just a little bit, Doctor Hanawalt, have people's attitudes toward doctors changed much today?

Doctor Hanawalt: Yes, definitely. A hundred years ago people were skeptical of doctors. Going to the doctor was often the last resort. Of course, the good old country doctor was often a revered figure, but not because of his medical knowledge. He was revered because he was a fine man; people lived or died because it was God's will.

Interviewer: Have we made a myth out of the good old country doctor?

Doctor Hanawalt: Yes. He did what he could, but he has been sentimentalized too much. Really, before our medical schools began, he was extremely limited in what he could do for people. And, of course, he was a country doctor simply because most people lived in the country.

Interviewer: Doctor Hanawalt, what do you think the work of the Michigan State Medical Society should be today?

Doctor Hanawalt: I think the Medical Society should be what it has always been — a supporter of progressive development of medicine — and it should take a definite stand on the things that affect medicine, I think, for example, medical education and legislation.

Interviewer: What do you think of the current dispute between osteopaths and doctors of medicine?

Doctor Hanawalt: Well, this gives you some idea of what the nineteenth century was involved in. There was a great deal of this sort of thing going on between the different medical sects. The great difference today, however, is that it is not a fight between quacks and intelligent people. Today, both M.D.'s and D.O.'s are intelligent and well-educated.

McCABE TESTIMONY IN CAPITOL BRIEFED

In testimony on proposed Medicare and Social Security Amendments of 1967 before the Committee on Ways and Means of the United States House of Representatives on March 6, Mr. John C. McCabe, President, Michigan Blue Shield advocated in part:

"One of the biggest paper work problems results from the receipted bill requirement which prevents the carrier from reimbursing the beneficiary a portion of his medical expenses unless he has receipts properly made out and attached to request for payment forms.

"Excessive work on Medicare claims takes three to four times longer than under the regular Blue Shield process.

"There is a great need for an education program conducted by the carrier but the responsibility for such a program is now assigned to government.

"Much time, effort, and money could be saved if record keeping were decentralized and each carrier given responsibility for those beneficiaries residing in its operating area.

"Some research and statistical requirements are unnecessarily cumbersome due to a shortage of skilled personnel which substantially adds to the costs of administrating. Suggests a system of sampling an audit similar to the present system used in their industrial reporting.

"Reduce excessive work load reports.

"Difficulty of split payment mechanism when the beneficiary has already paid more than the deductible and/or the coinsurance amount to the provider of service.

"Insufficient lead time provided for programming SSA revisions."

Mr. McCabe concluded "we believe some of the problems lie in the law, some in the benefit program, and some in the centralized nature of certain administrative aspects, as well as some of the interpretations put on the law by officials responsible for its operation. But, we are convinced and so are many of my associates in other Blue Shield plans that all of us, including government, can and will do a better job if certain administrative relief is afforded."

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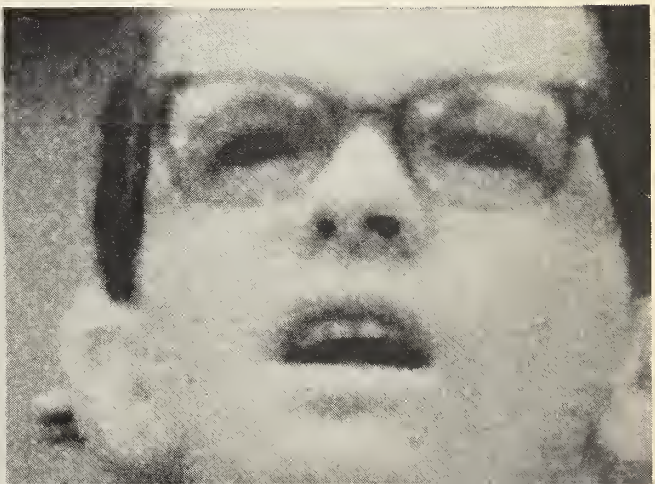

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LENAWEE	Richard E. Dustin, MD 103 West Brown Street Tecumseh, Michigan	Richard D. Coak, MD 602 East Pottawatamie St. Tecumseh, Michigan
LIVINGSTON	Reginald Phillips, MD 10639 Hamburg Road Hamburg, Michigan	Roscoe V. Stuber, MD 1132 Burns Street Howell, Michigan
LUCE	Bernard Keizer, MD Newberry State Hospital Newberry, Michigan	R. E. Gibson, MD 207 West John Street Newberry, Michigan
MACOMB	William E. Rush, MD St. Johns Hospital Detroit, Michigan	Gerald W. Morris, MD 14 Belleview Mt. Clemens, Michigan
MANISTEE	Ernest C. Hansen, MD 326 First Street Manistee, Michigan	James Kiley, MD Forest Clinic Manistee, Michigan

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Menominee	Nils O. Agneberg, MD 531 First Street Menominee, Michigan	L. Grant Glickman, MD Menominee, Michigan
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Monroe	Z. B. Cigany, MD Carleton, Michigan	R. A. Frary, MD 505 Strasburg, R. #1 Monroe, Michigan 48161
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North Central	Lloyd T. Wiegerink, MD West Branch, Michigan	Thomas A. Baker, MD West Branch, Michigan
Northern Michigan	Richard Kuecht, MD 403 East Lake Street Petoskey, Michigan	Peter J. Connaughton, MD Burns Clinic Petoskey, Michigan
Oakland	Kenneth VandenBerg, MD 35 South Johnson Pontiac, Michigan 48053	Frederick W. Bryant, MD 201 Washington Sq. Plaza Royal Oak, Michigan 48067
Oceana	Alvin J. Ratzlaff, MD 219 State Street Hart, Michigan	Alvin J. Ratzlaff, MD 219 State Street Hart, Michigan
Ontonagon	D. H. Archibald, MD 102 Second Street Ontonagon, Michigan	Ian Sayani, MD 47 Oak Street Whitepine, Michigan 49971
Ottawa	S. W. Kuipers, MD 144 West 26th Street Holland, Michigan	Jerome H. Wassink, MD 601 Michigan Avenue Holland, Michigan
Saginaw	R. J. Gerard, MD 2419 Mackinaw Saginaw, Michigan	J. T. Keyes, MD 10222 Maple Road Birch Run, Michigan
St. Clair	Nicholas G. Douvas, MD 1131 Erie Port Huron, Michigan	Erwin W. Blatter, MD 3864 Gratiot Avenue Port Huron, Michigan
St. Joseph	Donald Schinnoski, MD 117 Spring Street Three Rivers, Michigan	John O'Dell, MD 120 Portage Three Rivers, Michigan

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WAYNE	*Brock E. Brush, MD Henry Ford Hospital Detroit, Michigan	J. C. Danforth, Jr., MD 20175 Mack Grosse Pte., Michigan
WEXFORD-MISSAUKEE	William M. Moon, MD 828 Oak Street Cadillac, Michigan	D. E. Van Alst, MD 828 Oak Street Cadillac, Michigan

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* The Wayne County Medical Society President after 5/1/67 will be Frank B. Bicknell, M.D., 938 David Whitney Building, Detroit.

Who's Who at the Medical Schools

Here are the current lists of the three Michigan medical schools' administrative leaders — deans, assistants, department chairmen. Michigan physicians may wish to save these pages for future reference.

MICHIGAN STATE UNIVERSITY COLLEGE OF HUMAN MEDICINE

ADMINISTRATION

William H. Knisely, Ph.D., Director, Institute of Biology and Medicine
Andrew D. Hunt, Jr., M.D., Dean
John C. Howell, Ph.D., Associate Dean
Thomas B. Hill, M.D., Assistant to the Dean for Admission and Student Affairs
Neil Bracht, M.D., M.S.W., Assistant to the Dean for Extramural and Community Affairs

DEPARTMENT CHAIRMEN

Anatomy: M. Lois Calhoun, D.V.M., Ph.D.
Anthropology: Moreau Maxwell, Ph.D.
Biochemistry: R. Gaurth Hansen, Ph.D.
Biophysics: Leroy G. Augenstein, Ph.D.
Medicine: Scott N. Swisher, Jr., M.D.
Microbiology: Philipp Gerhardt, Ph.D.
Pathology: C. Cleon Morrill, D.V.M., Ph.D.
Pharmacology: Theodore M. Brody, Ph.D.
Physiology: Francis J. Haddy, M.D., Ph.D.
Psychology: Clarence L. Winder, Ph.D.
Sociology: William H. Form, Ph.D.
Zoology: Charles S. Thornton, Ph.D.
Office of Medical Education, Research and Development: Hilliard Jason, M.D., Ed.D.
School of Medical Technology: Esther M. Smith, Ph.D.

UNIVERSITY OF MICHIGAN MEDICAL SCHOOL

ADMINISTRATION

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Alexander Barry, Ph.D., Associate Dean
Beverly C. Payne, M.D., Assistant Dean
Fred J. Hodges, M.D., Assistant to the Dean

DEPARTMENT CHAIRMEN

Anatomy: Russell T. Woodburne, M.D.
Anesthesiology: Robert S. Sweet, M.D.
Biological Chemistry: Halvor N. Christensen, M.D.
Dermatology: Arthur C. Curtis, M.D.
Human Genetics: James V. Neel, M.D.
Internal Medicine: William D. Robinson, M.D.
Microbiology: Walter J. Nungester, M.D.
Neurology: Russell N. DeJong, M.D.
Obstetrics and Gynecology: Robert Willson, M.D.
Opthalmology: F. Bruce Fralick, M.D.
Otorhinolaryngology: Walter P. Work, M.D.
Pathology: A. James French, M.D.
Pediatrics: James L. Wilson, M.D.
Pharmacology: Maurice H. Seevers, M.D.
Physical Medicine: James W. Rae, Jr., M.D.
Physiology: Horace W. Davenport, M.D.
Postgraduate Medicine: H. A. Towsley, M.D., Associate Director
Psychiatry: Raymond W. Waggoner, M.D.
Radiology: Walter M. Whitehouse, M.D.
Surgery: Charles G. Child, III, M.D.

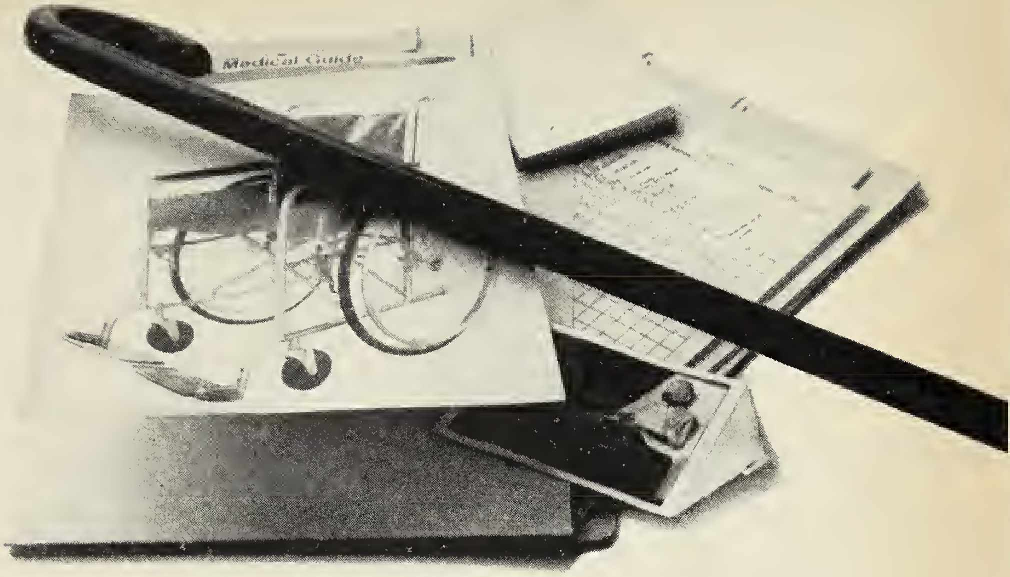
WAYNE STATE UNIVERSITY MEDICAL SCHOOL

ADMINISTRATION

Gordon H. Scott, Ph.D., Vice President for Medical School Development
Ernest D. Gardner, M.D., Dean
Norton Levitt, Ph.D., Associate Dean, Academic Affairs
Alexander J. Walt, M.D., Ch.B., Assistant Dean, Clinical Coordination and Continuing Education
Thomas A. Bruce, M.D., Assistant Dean
Ben Rubenstein, Ph.D., Director of Admissions and Student Advisement
William J. Stapleton, M.D., Emeritus Associate Dean

DEPARTMENT CHAIRMEN

Anatomy: Clement A. Fox, Ph.D.
Anesthesiology: Gianfranco Dal Santo, M.D.
Audiology: John H. Gaeth, Ph.D.
Biochemistry: Ray K. Brown, M.D., Ph.D.
Community Medicine: John J. Hanlon, M.D.
Dermatology: Hermann K. B. Pinkus, M.D.
General Surgery: Alexander J. Walt, M.D., Ch.B.
Internal Medicine: Richard J. Bing, M.D.
Microbiology: Fred L. Rights, Ph.D.
Neurology: John Stirling Meyer, M.D.
Neurosurgery: E. S. Gurdjian, M.D., Ph.D.
Gynecology and Obstetrics: T. N. Evans, M.D.
Occupational and Environmental Health: Arthur J. Vorwald, M.D., Ph.D.
Ophthalmology: Albert D. Ruedemann, M.D.
Orthopedic Surgery: Herbert E. Pedersen, M.D.
Otolaryngology: G. Jan Beekhuis, M.D.
Pathology: Jacob L. Chason, M.D.
Pediatrics: Paul V. Woolley, Jr., M.D.
Physical Medicine and Rehabilitation: Joseph N. Schaeffer, M.D.
Physiology and Pharmacology: Walter H. Seegers, Ph.D.
Psychiatry: Jacques S. Gottlieb, M.D.
Radiology: Maurice Tatelman, M.D.
Chairman of Urology: James M. Pierce, Jr., M.D.



STRESSCAPS

in chronic illness

B and C vitamins are part of therapy: An imbalance of water-soluble vitamins and chronic illness often go hand in hand. STRESSCAPS capsules, containing therapeutic quantities of vitamins B and C, are formulated to meet the increased metabolic demands of patients with physiologic stress. In chronic illness, as with many stress conditions, STRESSCAPS vitamins are therapy.

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FOR PROFESSIONAL RECOMMENDATION ONLY

Each capsule contains:

Vitamin B_1 (as Thiamine Mononitrate)	10 mg
Vitamin B_2 (Riboflavin)	10 mg
Vitamin B_6 (Pyridoxine HCl)	2 mg
Vitamin B_{12} Crystalline	4 mcgm
Vitamin C (Ascorbic Acid)	300 mg
Niacinamide	100 mg
Calcium Pantothenate	20 mg

Recommended intake: Adults, 1 capsule daily, for the treatment of vitamin deficiencies. Supplied in decorative "reminder" jars of 30 and 100; bottles of 500.

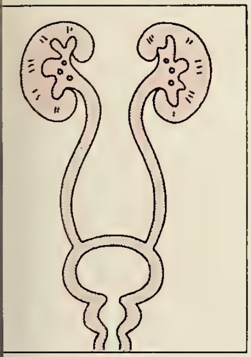
LEDERLE LABORATORIES, A Division of American Cyanamid Company, Pearl River, New York Lederle

628-6—3614

When the battle with bacteria is in the G. U. trac

Artist's conception of acute infection
showing G.U. pathogens with predominance of *E. coli*.

onsider Gantanol (sulfamethoxazole)



For vigorous treatment of G.U. infections before the invaders become entrenched... Gantanol (sulfamethoxazole) offers a comprehensive spectrum of antibacterial effectiveness against most common gram-negative as well as gram-positive invaders. In addition, it provides satisfactory concentrations in the blood and urine with ready diffusion to interstitial fluids for antibacterial activity at foci bacterial invasion.

igh antibacterial activity against *E. coli* and other ommon urinary pathogens... A review of 153 cases of cute G.U. infections reported in the literature shows that 90% responded to Gantanol (sulfamethoxazole), with over one-half of these patients showing excellent relief of symptoms.[1,2] Even in stubborn chronic G.U. infections, almost 60% of 450 patients improved on Gantanol (sulfamethoxazole), including many who had not responded to other antibacterials.[1-6]

Generally uncomplicated therapy enhances the favorable clinical results... Of the total 686 patients from the studies cited,[1-6] only three discontinued therapy because of side effects. Most of the side effects reported (approximately 3%) were mild and included nausea and/or vomiting, skin rash, dizziness, headache, gastritis, generalized uneasiness and itching.[1-6]

1. Peters, J. H.: *J. Urol.*, *87*:747, 1962. 2. Draper, J. W., *et al.*: *South. M. J.*, 57:920, 1964. 3. Stewart, B. L.: *J. Urol.*, *87*:491, 1962. 4. Hagstrom, R. S.: *Rocky Mountain M. J.*, 59:(2), 37, 1962. 5. Arnold, J. H.: *Clin. Med.*, *71*:552, 1964. 6. Nelson, C. G.: *Colorado GP*, *3*:(3), 2, 1961.

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efore prescribing, please consult complete product formation, a summary of which follows:

ontraindicated in sulfonamide-sensitive patients, egnant females at term, premature infants, or newrn infants during first three months of life.

arnings: Use only after critical appraisal in patients ith liver damage, renal damage, urinary obstruction blood dyscrasias. If toxic or hypersensitivity reacons or blood dyscrasias occur, discontinue therapy. In termittent or prolonged therapy, blood counts and er and kidney function tests should be performed.

recautions: Observe usual sulfonamide therapy preutions, including maintenance of an adequate fluid take. Use with caution in patients with histories of lergies and/or asthma. Patients with impaired renal nction should be followed closely since renal impairent may cause excessive drug accumulation. Occaonal failures may occur due to resistant microorganms. Not effective in virus or rickettsial infections.

dverse Reactions: Headache, nausea, vomiting, urtiria, diarrhea, hepatitis, pancreatitis, blood dyscraas, neuropathy, drug fever, skin rash, Stevens-Johnson syndrome, injection of the conjunctiva and sclera, petechiae, purpura, hematuria or crystalluria may occur, in which case the dosage should be decreased or the drug withdrawn.

Dosage: Adults—4 tablets initially, then 2 tablets b.i.d. or t.i.d. depending upon severity of infection. Children—1 tablet/20 lbs initially, followed by ½ tablet/20 lbs b.i.d.

How Supplied: Tablets, 0.5 Gm, bottles of 50.

Roche Laboratories
Division of Hoffmann-La Roche Inc.
Nutley, New Jersey 07110

ROCHE

when there are bacterial invaders in the bladder, prostate or kidneys

Gantanol®
(sulfamethoxazole)

Bartholin's gland
Periurethral glands
Cervical glands
Flagyl®.....
brand of
metronidazole
Seminal vesicles
Bladder
Prostate gland

Destroys Trichomonads Wherever They Are

Flagyl seeks out the sites where trichomonads hide. Only a systemic agent can. Flagyl does, selectively and effectively.

Flagyl destroys trichomonads in the inner crypts, glands and cavities of the genitourinary tract in both women and men. Consequently, Flagyl is capable not only of curing trichomoniasis in women but also of preventing reinfection.

Correctly used, with due attention to repeat courses of treatment for resistant, deep-seated invasion and to the presumption of reinfection from male consorts, Flagyl has repeatedly produced up to 100 per cent cure in large series of patients.

When the diagnosis of trichomoniasis is positive, Flagyl is positive.

Dosage and Administration – In *women:* one 250-mg. oral tablet three times daily for ten days. A vaginal insert of 500 mg. is available for local therapy when desired. When used, one vaginal insert should be placed high in the vaginal vault each day for ten days; concurrently two oral tablets should be taken daily.
In *men* in whom trichomonads have been demonstrated: one 250-mg. oral tablet twice daily for ten days.

Contraindications – Pregnancy; disease of the central nervous system; evidence or history of blood dyscrasia.

Precaution–Complete blood cell counts should be made before, during and after therapy, especially if a second course is necessary.

Side Effects–Infrequent and minor side effects include nausea, metallic taste, furry tongue and headache. Other effects, all reported in an incidence of less than 1 per cent, are diarrhea, dizziness, vaginal dryness and burning, dry mouth, rash, urticaria, gastritis, drowsiness, insomnia, pruritus, sore tongue, darkened urine, anorexia, vomiting, epigastric distress, dysuria, depression, vertigo, incoordination, ataxia, abdominal cramping, constipation, stomatitis, numbness of an extremity, joint pains, confusion, irritability, weakness, flushing, cystitis, pelvic pressure, dyspareunia, fever, polyuria, incontinence, decreased libido, nasal congestion, proctitis and pyuria. Elimination of trichomonads may aggravate candidiasis.

SEARLE *Research in the Service of Medicine*

Did Dorothy Larson show you her ankles in private? Now she shows them in public.

Your office examination would have confirmed that Mrs. Larson was up to her knees in edema. Her heart was beginning to fail. And her ankles had disappeared under an inch of salty water.

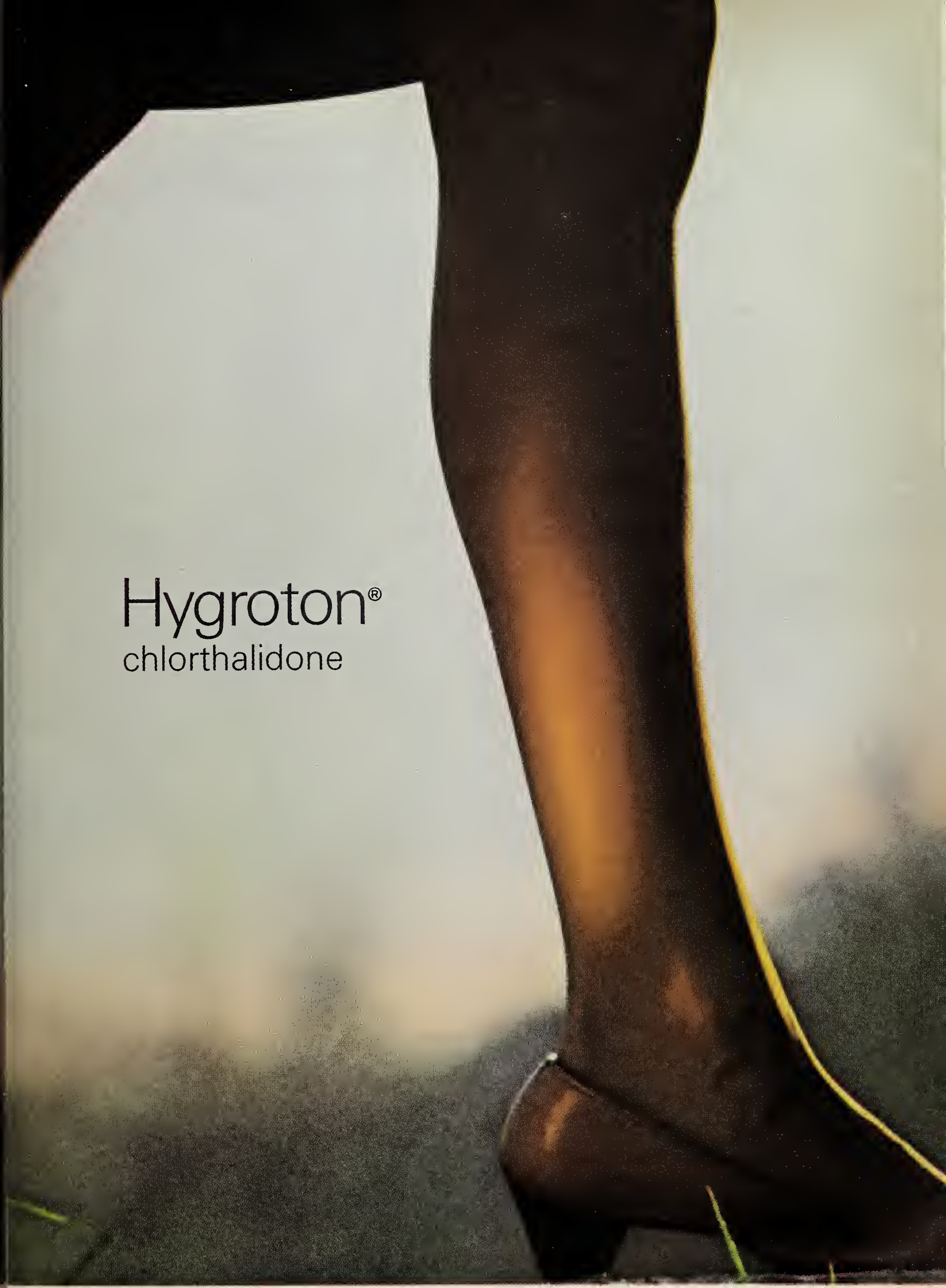
Along with digitalis, you might have prescribed Hygroton. To get rid of the edema. And to keep it from coming back. And you prescribe Hygroton the same way you usually prescribe digitalis: just once a day.

Tablet for tablet, Hygroton is just about the most effective diuretic going. And it costs a fraction of what Mrs. Larson would have to spend for equivalent therapy with short-acting diuretics.

In fact, Hygroton is an awfully nice way to treat the Mrs. Larsons in your practice. Just tell them you can get their ankles back at half price.

Indications: Hypertension and many types of edema involving retention of salt and water.
Contraindications: Hypersensitivity and most cases of severe renal or hepatic disease.

Warning: With administration of enteric-coated potassium supplements, the possibility of small bowel lesions should be kept in mind.
Precautions. Reduce dosage of concomitant antihypertensive agents by at least one-half. Discontinue if the BUN rises or liver dysfunction is aggravated. Electroly imbalance and potassium depletion may occur; take special care in cirrhosis or severe ischemic heart disea



in patients receiving corticosteroids, ACTH, or digi-
s. Salt restriction is not recommended.
e Effects: Dizziness, weakness, nausea, vomiting,
erglycemia, hyperuricemia, headache, muscle cramps, postural hypotension, constipation, leukopenia, thrombocytopenia, agranulocytosis, impotence, dysuria, transient myopia, skin reactions, including urticaria and purpura, epigastric pain, or G.I. symptoms after prolonged administration.

Average Dosage: One tablet (100 mg) with breakfast daily or every other day.
Availability: Tablets of 100 mg. 6524-V(B)
For full details, see prescribing information.

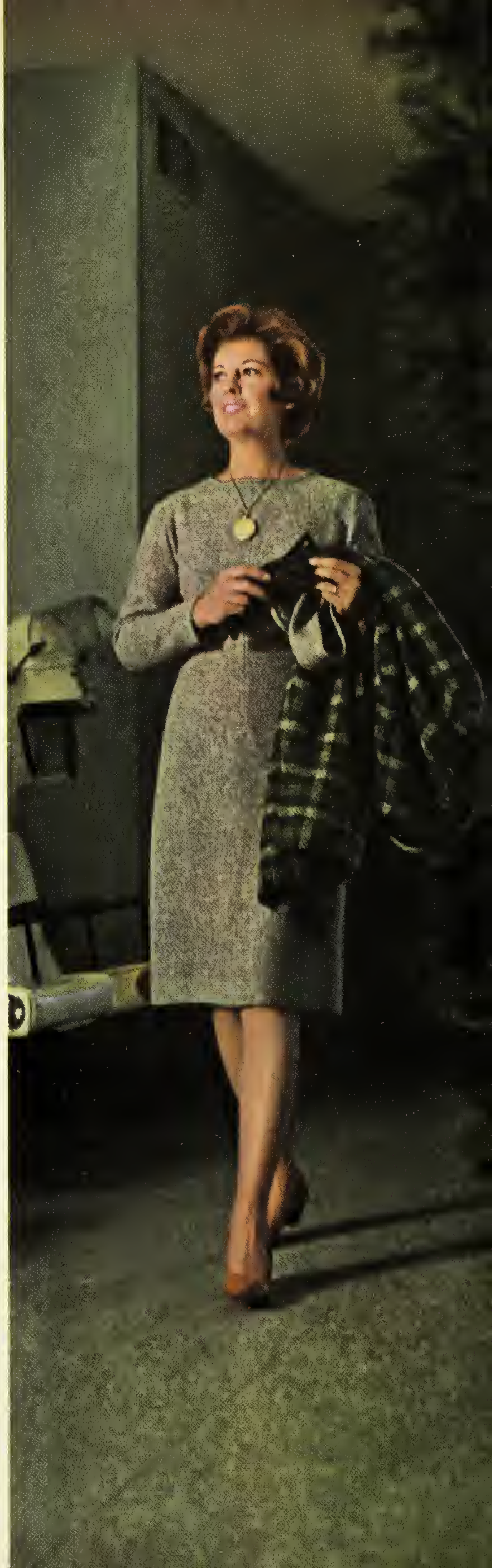
...so you might say Hygroton is good public relations for Mrs. Larson

Because it gets her *out* in public in the first place. At 43, Mrs. Larson worries about appearances and swollen ankles don't help.

But Hygroton's cosmetic effect is only half the story. Hygroton and digitalis therapy helps her get back in the swing of things. Gives her a second wind. Gets rid of the extra pillow she needed for a good night's sleep. Now she even likes to take walks. Just for the fun of it!

When her troubles began, Mrs. Larson thought they were the signs of the change of life. It's a change all right, but one you can treat. And you can count on Hygroton to help keep her in public instead of in the hospital.

See preceding pages for brief summary of prescribing information.



Geigy

Geigy Pharmaceuticals
Division of Geigy Chemical Corporation
Ardsley, New York

"SHAKES" AND "AGER" MADE LIFE TOUGH FOR EARLY MICHIGAN PIONEERS

The following is quoted from Michigan: A History of the Wolverine State by Willis F. Dunbar, Kalamazoo, and published by William B. Eerdmans Publishing Company, Grand Rapids, in 1965.

The pioneer is often thought of as a strong, healthy specimen, but accounts of pioneer life in Michigan give the impression that there was a great deal of sickness.

What the settlers called fever and ague was so prevalent that it was rather unusual to escape it. "He ain't sick, he's just got the ager" was a common remark. This ailment was actually malaria and was spread by the mosquitoes that bred in the marshes and swamps that were so prevalent before the land was drained. Quinine, commonly used today in the treatment of this disease, was then known as "Peruvian bark." It was expensive and many doctors refused to prescribe it.

MOST VICTIMS just endured the ailment, which was debilitating but seldom fatal. The victim first yawned and stretched a great deal, felt tired, and then began to have fierce chills. After an hour or so of this a raging fever would come with racking headache and back pains. Then after copius sweating the sufferer would feel as well as ever. These attacks usually occurred at a certain time each day, or on alternate days, or even every third day. Work schedules were arranged to accommodate a person's "shakes." "And on every day there, as sure as day would break, their neighbor 'Ager' came that way, inviting them to shake," wrote historian A. D. P. Van Buren.

LATE SUMMER USUALLY was the most sickly time for the pioneers. Various types of "billious fevers," typhoid epidemics, "milk sick," and digestive upsets were common, caused in the main, no doubt, by lack of refrigeration, unpasteurized milk, and contaminated water. Epidemics of erysipelas (called St. Anthony's Fire) occurred in Michigan in early times. Contagious diseases such as scarlet fever, diphtheria, measles, mumps, and smallpox took a heavy toll. Infant mortality was high. Pneumonia, or "lung fever," was most prevalent in winter. Rheumatism was common, and probably was caused in part by exposure in all kinds of weather, the practice of drying wet clothing on the body, and decaying, unrepaired teeth.

Worst of all was the frightful epidemic of Asiatic cholera that struck Detroit in 1832 and again in 1834. Most of the deaths from this terrible visitation, however, were in the towns and not among the pioneer farmers. While illnesses of various kinds were rampant in pioneer times, it is a strange fact that there are several instances of persons suffering from a disease that threatened to be fatal who came to Michigan and recovered their health. One such was Charles T. Harvey, builder of the Soo Canal.

The pioneers treated many ailments with roots and herbs. The lore that contained prescriptions of these remedies was brought from the East or learned from the Indians. Hideous concoctions of foul materials were resorted to; the worse the illness the more repulsive the remedy. R. C. Burley wrote in *Pioneer Health and Medical Practices in the Old Northwest Prior to 1940:*

> "For fevers, they recommended sweating and snake root with a purge of white walnut bark peeled upward, sassafras, dogwood, willow, or a glass of pearl ash and water. The breaking out in eruptive fevers, such as measles, was hastened by the use of sheep-dung tea, popularly known as "nanny tea." For pleurisy, if no bleeder was at hand, catnip or penny-royal, or butterfly tea, applications of boiled hot nettles, or brimstone, sulphur, and eggs . . . ."

There were a considerable number of doctors in pioneer Michigan, but often a long journey was necessary to summon a physician, and when he came his remedies might be no better than those devised by the pioneer and his wife.

Copious bleedings and the use of calomel were favorite procedures of these early doctors, and the effect was frequently little more than to sap the strength of the patient. The doctor could be of use in setting bones and, of course, the psychological effect of having the advice of a doctor was helpful. Few of the doctors had studied at a medical school; most of them had learned the secrets of their profession through an apprenticeship with an established doctor. The physicians of this early period in some cases did not devote their full time to the practice of medicine. Some operated farms or engaged in business. The first postmaster of Kalamazoo was a doctor.

AS EARLY AS 1819 the governor and judges had passed a law authorizing the formation of county medical societies to pass on the qualifications of persons aspiring to practice medicine. But little was accomplished; few doctors apparently bothered to secure a license to practice and quackery abounded. There were several different "schools" of medicine, one of which was called the "botanical." The first medical journal and perhaps the first magazine produced in Michigan was the *Vegetable Herald*, published in Kalamazoo and devoted to the advocacy of "botanical medicine."

In spite of his shortcomings the pioneer country doctor had a more intimate relationship with his people than the lawyer or the minister. "Though frequently short of learning, intolerant of rivals and given to petty quarrels, he was aboundantly possessed of those qualities which made his humanity triumph over both nature and human selfishness, and himself usually a figure feared, loved, and venerated," wrote R. C. Burley in *The Old Northwest*.

MEDICAL STIMULUS

No class of men needs friction so much as physicians; and no class gets less. The daily round of a busy practitioner tends to develop an egoism of a most intense kind to which there is no antidote. The few setbacks are forgotten and mistakes are often buried, and ten years of successful work tends to make a man dogmatic, intolerant of correction, and abominably self-centered. To this mental attitude the medical society is the best corrective, and a man misses a good part of his education who does not get knocked about a bit by his colleagues in discussion.

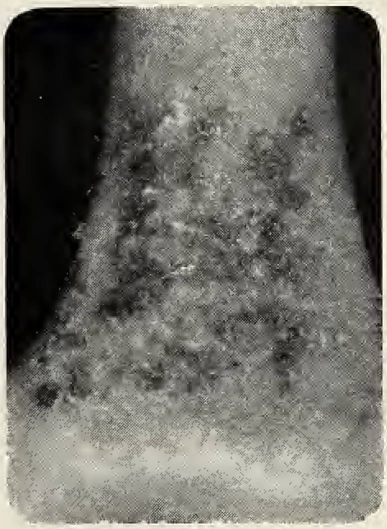
Sir William Osler

TO ALL MY PATIENTS
I invite you to discuss frankly with me any questions regarding my services or my fees.
The best medical service is based on a friendly, mutual understanding between doctor and patient.
A.M.A.
AMERICAN MEDICAL ASSOCIATION

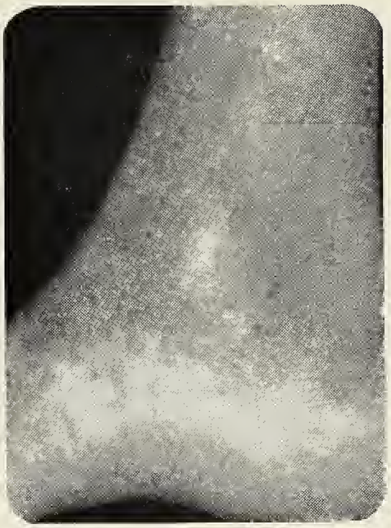
This attractive office plaque, available from the American Medical Association, will encourage better understanding between you and your patients. Suitable for wall or desk display, the plaque measures 6" x 10½". The lettering is white on a dark brown background and the frame is durable beige plastic. The plaque is designed to blend well with any office decor. Cost of the plaque is $1.25, postpaid. To place your order, write to the Order Department, American Medical Association. Make check payable to the AMA.

AMERICAN MEDICAL ASSOCIATION
535 North Dearborn Street • Chicago, Ill. 60610

Eczema of many years... controlled in two weeks



Before treatment



After treatment —
with ARISTOCORT Topical
Ointment 0.1% for two weeks

ARISTOCORT® Triamcinolone Acetonide Topicals have proved exceptionally effective in the control of various forms of eczema: allergic, atopic, nummular, psoriatic, and mycotic.

In most cases responsive to topical ARISTOCORT, the 0.1% concentration is sufficiently potent. The 0.5% concentration provides enhanced topical activity for patients requiring additional potency for proper relief.

Administration and Dosage: Apply sparingly to the affected area 3 or 4 times daily. Some cases of psoriasis may be more effectively treated if the 0.1% Cream or Ointment is applied under an occlusive dressing.

Contraindications: Tuberculosis of the skin, herpes simplex, chicken pox and vaccinia.

Precautions and Side Effects: Do not use in the eyes or in the ear (if drum is perforated). A few individuals react unfavorably under certain conditions. If side effects are encountered, the drug should be discontinued and appropriate measures taken. Use on infected areas should be attended with caution and observation, bearing in mind the potential spreading of infection and the advisability of discontinuing therapy and/or initiating antibacterial measures. Generalized dermatological conditions may require systemic corticosteroid therapy. Steroid therapy, although responsible for remissions of dermatoses, especially of allergic origin cannot be expected to prevent recurrence. The use over extensive body areas, with or without occlusive nonpermeable dressings, may result in systemic absorption. Appropriate precautions should be taken. When occlusive nonpermeable dressings are used, miliaria, folliculitis and pyodermas will sometimes develop. Localized atrophy and striae have been reported with the use of steroids by the occlusive technique. When occlusive nonpermeable dressings are used, the physician should be aware of the hazards of suffocation and flammability. The safety of use on pregnant patients has not been firmly established. Thus, do not use in large amounts or for long periods of time on pregnant patients.

Available in 5 Gm. and 15 Gm. tubes and ½ lb. jars.

PHOTOGRAPHS COURTESY OF M. M. NIERMAN, M.D.

Aristocort® Topical Ointment 0.1% and Cream 0.1%, 0.5%
Triamcinolone Acetonide
Also available in foam form.

LEDERLE LABORATORIES, A Division of American Cyanamid Company, Pearl River, New York

406-6

Kent Foundation Work Impressive

The Kent Medical Foundation, formulated as a charitable, non-profit, scientific trust, has developed into a complex organization encompassing many valuable areas of activity.

To help fulfill its object of developing and stimulating students to enter careers in the scientific health care field, and to further aid those committed to such careers, the Foundation annually grants scholarships and interest-free loans to worthy students.

ACCORDING TO Fred C. Brace, M.D., Grand Rapids, President of the Kent Medical Foundation, twelve science students each year are given full-tuition college scholarships, and 12 full-year tuition scholarships for nurses are given to the three local hospital nursing schools, Butterworth, St. Mary's, and Blodgett.

"As of January 1, 1966, 78 area students had received grants or loans from the Trust. The Foundation is now awarding 24 scholarships for the current year, Doctor Brace reported.

"This money has enabled deserving students to pursue studies in areas such as pre-medicine, predentistry, medicine, registered nursing, medical technology, and physical therapy," he continued. "Generally, grants are made to qualified students engaged in preparation for scientific health careers, and loans are made to deserving medical students," President Brace said.

To stimulate interest in health careers among high school students, the Foundation annually presents science books to libraries of all 32 high schools in Kent County. "A member of the Kent County Medical Society makes the presentation with a short talk on health careers," Doctor Brace stated. "Last year each school received the *Harper's Encyclopedia of Science,* and this year they were given a new *Dorland's Medical Dictionary* and the AMA's *Today's Health Guide,*" the President added.

ONE OF THE most rewarding projects the Foundation has ever sponsored was the 1963 Health Fair, the first held in Michigan. The Fair's purpose was to introduce the multitude of careers available in health fields to area students from the sixth through 12th grades. "An outstanding success," Doctor Brace said, "over 40,000 students and 1,540 teachers from 245 schools attended."

In addition to President Brace, officers for the current year are: Donald Porter, Vice President; Charles Wilkinson, M.D., Secretary-Treasurer; and Roger Warnshuis, Executive Director.

International Travel Vaccination Rules Explained Again

Because the expected increase in international travel will soon occur, the Michigan State Medical Society is again printing the current regulations for all vaccinations performed in the United States for international travel.

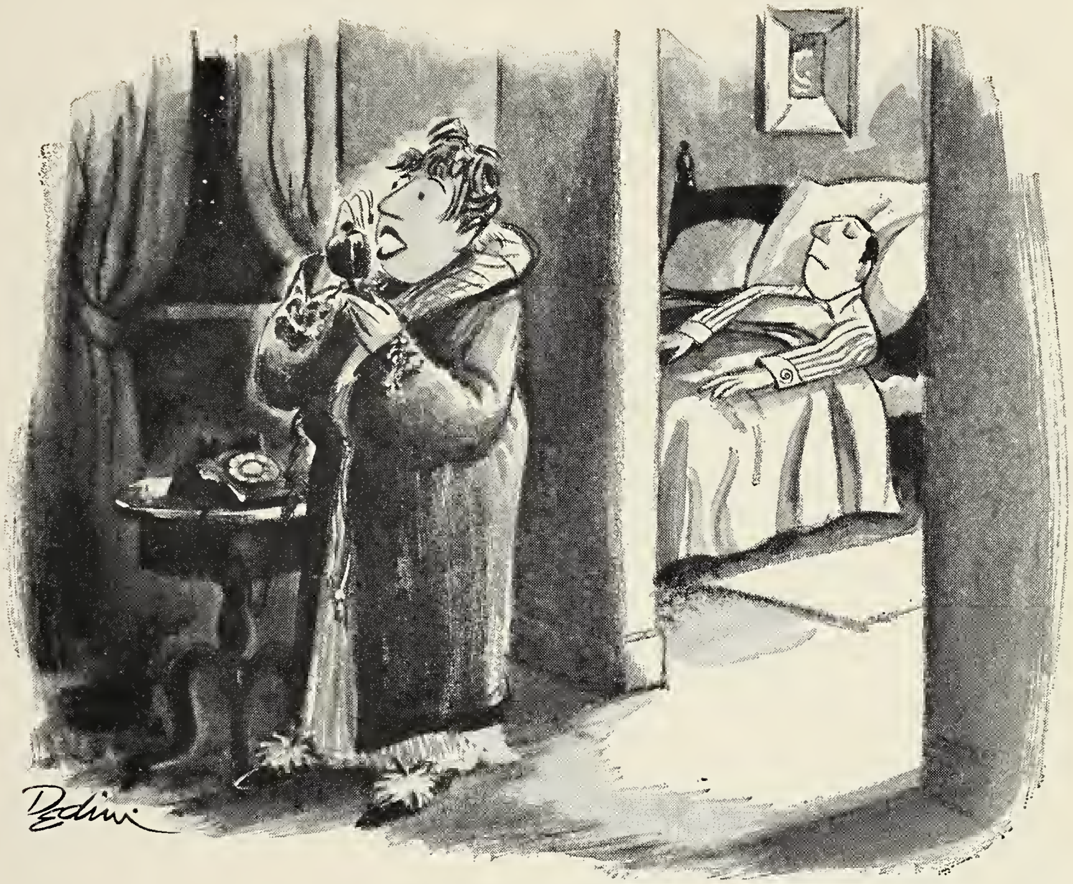
Smallpox, Cholera, and Yellow Fever Vaccination Certificates already issued remain valid until the expiration date of the certificates.

The Eighteenth World Health Assembly adopted the recommendation of the Committee on International Quarantine in May 1965 to amend the smallpox vaccination certificate to indicate whether a freeze-dried or liquid vaccine was used and to include the origin and batch number of smallpox vaccine. The new certificate will come into effect January 1, 1967.

The validation limit for Yellow Fever Vaccination Certificates was automatically extended for ten years from the date of vaccination or revaccination. The International Certificate of Vaccination or Revaccination against Yellow Fever was amended to extend the validity of the certificates from six to ten years as of May 12, 1965.

Persons or organizations requesting a bulk supply of these certificates can write to the Superintendent of Documents, Government Printing Office, Washington, D.C. 20402, where the certificates are on sale at 10 cents each or $5 per hundred.

(Editor's Note: This information appeared in the January issue of *Michigan Medicine* and is restated again as overseas travel increases during the summer.)



"George wants to know if it's okay to take his cold medicine now, Doctor, instead of seven o'clock?"

The long-continued action of Novahistine LP should help you both get a good night's sleep. Two tablets in the morning and two in the evening will usually provide round-the-clock relief by helping clear congested air passages for freer breathing. Novahistine LP also helps restore normal mucus secretion and ciliary activity—normal physiologic defenses against infection of the respiratory tract. Use cautiously in individuals with severe hypertension, diabetes mellitus, hyperthyroidism or urinary retention. Caution ambulatory patients that drowsiness may result. Each Novahistine LP tablet contains: phenylephrine hydrochloride, 25 mg., and chlorpheniramine maleate, 4 mg.

NOVAHISTINE® LP

DOW **PITMAN-MOORE** Division of The Dow Chemical Company, Indianapolis

Carnation research and development laboratories announce the first optimum-nutrition infant formula

Optimil

This extended formula, completely compatible with the infant, has demonstrated its advantages over older modified-milk formulas in intensive clinical tests.[1-4]

It provides:

OPTIMUM CONTENTMENT.
New Optimil's marked superiority in achieving satiety–reflected by infants' infrequent crying—is most reassuring to mothers.

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New Optimil provides protein, fat and carbohydrate in kinds and amounts more consistent with the infant's needs. Spitting-up is minimized and skin integrity maximized.

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New Optimil's superior nutritional balance of major nutrients and their components provides highest caloric efficiency. Optimum protein and mineral content assures lowest renal solute load.

Optimil is recommended as regular feeding for optimum growth and development of normal newborns; as an ideal supplement to or replacement for breast milk; as sound nutrition for prematures; and as prophylaxis against both essential fatty acid and nutritional iron deficiency.

Optimil, diluted 1 to 1 with water, provides a standard feeding formula–20 calories per oz. Supplied in new, convenient 16-oz. cans, Optimil is available for your specification at leading drug stores.

The complete Optimil system available to hospitals includes: 5% Glucose Water in presterilized 4-oz. disposable bottles • Optimil 13 calories/oz. Prepared Formula in 4-oz. disposable bottles* • Optimil 20 calories/oz. Prepared Formula in 4-oz. disposable bottles* • Optimil Concentrated Infant Formula in 16-oz. cans • Sterilized disposable nipples • Optimil Gift Pack: six 4-oz. disposable bottles of Optimil 20 calories/oz. Prepared Formula* and one 16-oz. can of Optimil Concentrated Infant Formula.

**prediluted and sterilized*

1. Carson, M., and Hart, L.: "New Perspectives on Nutritional Aspects of Modified Milk-Fat Formulas," Colloquim held under the auspices of The Pediatric Department, Western Reserve University School of Medicine at Cleveland, Ohio, Sept. 8, 1966. Data available on request.

2. Hepner, R.: ibid. 3. Nichols, M.: ibid. 4. McCann, M.L.; Teree, T., and Wallace, W.; ibid.

Watch for further details on Optimil, the first optimum-nutrition infant formula

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"Please Send Me" . . . They Write

BY ALICE SNELGROVE
OF THE MSMS STAFF

The Medical Society frequently answers requests from young people for information about a variety of subjects. Here are some recently-received inquiries about health careers.

Despite their sometimes casual spelling, grammar, and style, they often reveal the type of alert mind that should be cultivated. The letters are printed here exactly as they were written.

"In school I am writing on the area of Doctors. I would like if you could send me some information on Doctors. This report would be mostly on Doctors-Medical. I would appericate this information."

"I am interested in medical working. I am in the process of collecting some information on this occupation. If you have some free literature on medical careers. Would you please send it to me?"

"Would you please send me some material concerning a veterinarian. I desire it for an essay required for Civics. I also understand that the material offered by you is free."

"Could you please send me information on nursing and doctoring and veterinarians. Please send all you can. Also, could you give me any information as to where I could send for additional information."

"I read your article about Medical Careers Needed. Well I am not of age to become a part of the Medical Carreer just yet. I am only 15 years of age, and will be 16 May 11, this year. I am a Sophomore. . . . I am planning to finish school, and when I do, I plan on going through Medical School in the Service. I want to take 4 to 8 years of training because I want to become a obstetrician. But if you would please send me some booklets or information of becoming a obstetrician. It would really please if you possibly could."

"I plan to make my future career medicine. As of now I am only 14 years old and in 9th grade and also a bit puzzled on what type of medicine I should like to attempt to make my career. I was told that you could possibly send me material if it wouldnt be much bother. I would appreciate very much all the help I can possibly get. Thank-you very much."

"I am very interested in becoming a Medical Assistant, and I was wondering if you could give me some information about becoming a Medical Assistant, also the place you could go to, to be trained. Could you Please send me any information about this field."

Noted and Quoted

Many of the rights of the individual have been lost to collectivism. In spite of all that is happening the vast majority of Americans are basking in the smugness of apathy and indifference. Too little concern is given to what happens to the individual, his neighbors, or the future of our country.

As physicians, we have person-to-person contact with more people daily than does any other profession or group. Medicine is dedicated to the total well-being of Man. Thus, whenever possible, making the people we contact aware of the problems we face as a nation is worthy. The good physician is usually an active citizen. Both as a good citizen and as a physician he is dedicated to the well-being of others.

—O. P. Leinbach, M.D., President
Iowa Medical Society

Praises AMA Career Handbook

"We recently have distributed 50 copies of the AMA 'Horizons Unlimited' to students interested in the medical field," writes Jo Little, Medical Librarian at St. Luke's Hospital in Saginaw.

"The booklet has been the most impressive I have seen of this type," she adds.

Small supplies of the fine AMA career handbook are available from MSMS, 120 West Saginaw, East Lansing.

“Take a laxative”
is a harsh sentence

Although there are more than 60 ethical laxatives available for the constipated patient, many, unfortunately, do not really produce an effect much like a normal bowel movement. Instead they whip the bowel, torment it and leave it irritated, inflamed and exhausted.

On the other hand, Dulcolax provides a nearly normal movement. Through its unique contact action, it induces the kind of natural contraction waves of the colon necessary for gentle, complete, comfortable bowel movements.

For your next constipated patient, try Dulcolax—the laxative with the gentle touch.

Dulcolax, brand of bisacodyl tablets (5 mg.)

Under license from
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G.m.b.H.

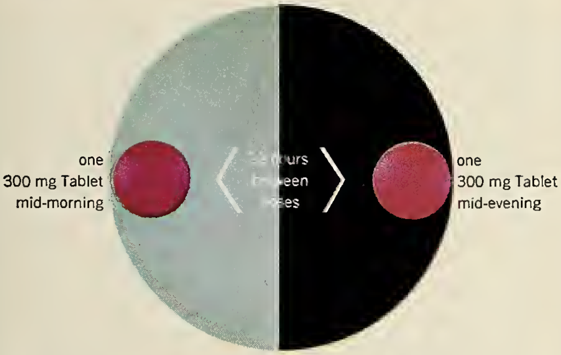
Geigy Pharmaceuticals
Division of
Geigy Chemical Corporation
Ardsley, New York

Dulcolax®
a gentle persuasion

DU-4807

Geigy

why wonder about a drug when you know DECLOMYCIN® DEMETHYLCHLORTETRACYCLINE is effective b.i.d.



It's made for b.i.d.

Effective in a wide range of everyday infections—respiratory, urinary tract and others—in the young and aged—the acutely or chronically ill—when the offending organisms are tetracycline-sensitive.

Contraindication—History of hypersensitivity to demethylchlortetracycline.

Warning—In renal impairment, usual doses may lead to excessive systemic accumulation and liver toxicity. Under such conditions, lower than usual doses are indicated and, if therapy is prolonged, serum level determinations may be advisable. A photodynamic reaction to natural or artificial sunlight has been observed. Small amounts of drug and short exposure may produce an exaggerated sunburn reaction which may range from erythema to severe skin manifestations. In a smaller proportion, photoallergic reactions have been reported. Patients should avoid direct exposure to sunlight and discontinue drug at the first evidence of skin discomfort.

Precautions and Side Effects—Overgrowth of nonsusceptible organisms may occur. Constant observation is essential. If new infections appear, appropriate measures should be taken. Use of demethylchlortetracycline during tooth development (last trimester of pregnancy, neonatal period and early childhood) may cause discoloration of the teeth (yellow-grey-brownish). This effect occurs mostly during long-term use but has also been observed in short treatment courses. In infants, increased intracranial pressure with bulging fontanels has been observed. All signs and symptoms have disappeared rapidly upon cessation of treatment. Side reactions include glossitis, stomatitis, proctitis, nausea, diarrhea, vaginitis and dermatitis. If adverse reaction or idiosyncrasy occurs, discontinue medication and institute appropriate therapy. Anaphylactoid reactions have been reported.

Average Adult Daily Dosage: 150 mg q.i.d. or 300 mg b.i.d. Should be given 1 hour before or 2 hours after meals, since absorption is impaired by the concomitant administration of high calcium content drugs, foods and some dairy products.

Capsules: 150 mg; *Tablets:* film coated, 300 mg, 150 mg, and 75 mg of demethylchlortetracycline HCl.

LEDERLE LABORATORIES, A Division of American Cyanamid Company, Pearl River, New York

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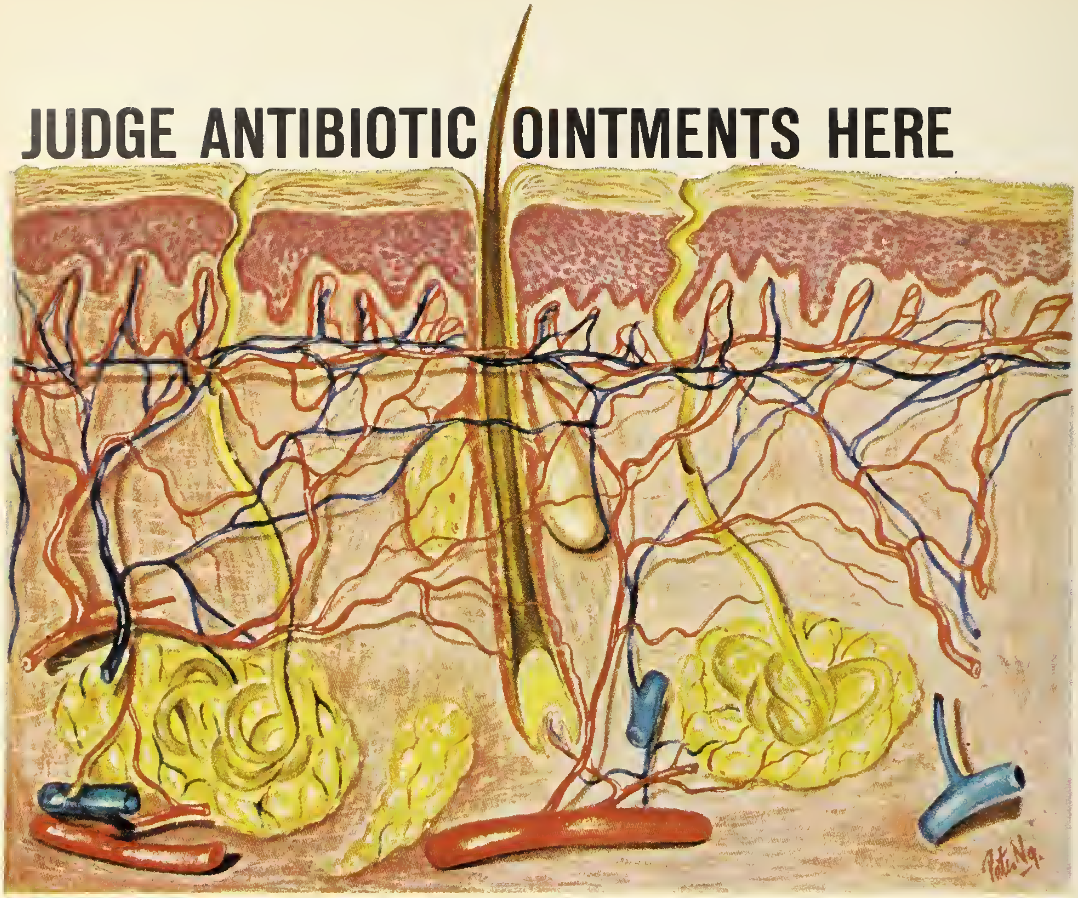

Results on skin are final proof of any topical antibiotic's effectiveness

No in vitro test can duplicate a clinical situation on living skin. 'Neosporin' (polymyxin B—bacitracin—neomycin) Ointment has consistently proven its effectiveness in thousands of cases of bacterial skin infection. The spectra of the three antibiotics overlap in such a way as to provide bactericidal action against most pathogenic bacteria likely to be found topically. Diffusion of the antibiotics from the special petrolatum base is rapid since they are insoluble in the petrolatum, but readily soluble in tissue fluids. The Ointment is bland and nonirritating.

Caution: As with other antibiotic preparations, prolonged use may result in overgrowth of nonsusceptible organisms and/or fungi. Appropriate measures should be taken if this occurs. Articles in the current medical literature indicate an increase in the prevalence of persons allergic to neomycin. The possibility of such a reaction should be borne in mind.

Contraindications: This product is contraindicated in those individuals who have shown hypersensitivity to any of its components.

Supplied: Tubes of 1 oz., ½ oz. with applicator tip, and ⅛ oz. with ophthalmic tip.

Complete literature available on request from Professional Services Dept. PML.

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POLYMYXIN B-BACITRACIN-NEOMYCIN
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BURROUGHS WELLCOME & CO. (U.S.A.) INC., Tuckahoe, N.Y.

Describes Detroit Infant Care Project

BY THE MICHIGAN DEPARTMENT OF PUBLIC HEALTH

It has been well documented that among medically indigent mothers and infants there is a significant increase in the risk of complications related to pregnancy: prematurity; maternal, perinatal, and neonatal mortality; and congenital birth defects. A major reason has been the lack of a comprehensive program of maternity and infant care available to this high-risk group. In effect, because of their low socio-economic status, these patients have been unable to benefit from the application of new knowledge and skills in medical care, most notably in the fields of obstetrics and gynecology, pediatrics, public health nursing, nutrition, and medical-social work.

To help remedy this situation in Detroit — the area with the highest number of high-risk, medically indigent people — the Michigan Department of Public Health and the Detroit City Health Department cooperatively developed the Detroit Maternity and Infant Care Project, with active local, state, and federal participation.

The broad objective of the project is to reduce the incidence of maternal and infant complications which may cause physical and mental defects in infants by providing comprehensive maternity and infant care to high-risk mothers and infants. As a means of reaching this broad objective, specific goals have been established for antepartum, postpartum, intrapartum, interconceptional, and infant care.

ANTEPARTUM CARE

(1) Reduce the patient load in tax-supported clinics by paying for care in voluntary hospital and satellite clinics.

(2) Make the clinic services readily available by locating them close to the people they are intended to serve.

(3) Provide a full range of medical, consultative, paramedical, and ancillary services with personalized care in an attractive setting.

(4) Locate clinics in existing hospitals so that a continuum of care in one setting is possible.

(5) Establish satellite clinics, as required.

(6) Provide transportation of patients to clinics, when necessary.

(7) Make expectant parent education available to all patients.

(8) Assure supervision of resident physicians and other clinic personnel providing care to patients.

INTRAPARTUM CARE

(1) Adequate medical, consultation, paramedical, and ancillary services as required.

(2) Adequate supervision of resident physicians, interns, and other hospital personnel providing care to patients.

(3) Coordination of care programs from the hospital setting to the home and clinic setting following discharge from the hospital.

POSTPARTUM CARE

(1) A health evaluation of the mother with treatment of abnormalities as indicated.

(2) Referral of patients to other clinics for interconceptional care of nonobstetric conditions.

(3) Postpartum care for patients with obstetric complications during the postpartum period.

(4) Counseling and assistance in the field of family planning according to the desires and beliefs of the individual patient. This care can be started during this period and continued indefinitely.

INTERCONCEPTIONAL CARE

Provide continued counseling and assistance indefinitely in the field of family planning according to the desires and beliefs of the individual patient.

INFANT CARE

(1) Provide adequate, organized supervision and care for infants in the newborn nursery with opportunities for consultation or referral to specialized treatment centers as indicated.

(2) Insure the provision of suitable care and follow-up for infants, beyond the initial period of hospital care, during the first year of life by expanding Detroit Health Department Child Health conferences; establishing clinics at or near participating hospitals; providing necessary immunizations, vitamins, and indicated medications ordered by physicians; and

fully using community resources in the provision of care.

PROJECT SUPPORT

The project is supported through funds administered by the United States Children's Bureau from an appropriation granted to the Michigan Department of Public Health. Matching local tax funds are administered by the Detroit Department of Health. Additional matching funds are provided by the United Community Services of Metropolitan Detroit. Although not involved financially, the Maternal Health Committees of the Michigan State Medical Society and the Wayne County Medical Society have been kept informed of the development of the project, and their suggestions have been accepted and their approval obtained. Individual committee members have been and will continue to be actively engaged in the project.

Other groups involved with the project include the Wayne County Department of Social Welfare, Wayne State University Medical School, Michigan Department of Social Services, University of Michigan School of Medicine, numerous individual Detroit physicians, and various voluntary agencies providing medical care or social services to medically indigent persons in Detroit.

NAMED TO DIRECT STATE SPECIAL EDUCATION

Marvin E. Beekman, Director of Special Education for the Lansing school system since 1952 and nationally known in the field of education for physically and mentally handicapped children, is the new director of special education for the State Department of Education.

Nearly 31,000 mentally handicapped children and about 73,500 physically handicapped children received special instruction during the 1965-1966 school year as well as another 1,350 who were emotionally disturbed.

WIN SKF AWARD

Mr. and Mrs. Glenn W. Geelhoed, juniors in the University of Michigan Medical School, have been awarded a Smith Kline & French Laboratories fellowship in the amount of $2,282 to permit them to assist for three months next winter at a mission hospital in West Africa.

The couple plans to leave in December for the 120-bed Christian Hospital at Takum in northern Nigeria. The Hospital is a mission station of the Christian Reformed Church, which has its headquarters in Grand Rapids.

BRIGHTON HOSPITAL

A non-profit foundation

FOR ALCOHOLISM

Member, Michigan Hospital Association

A facility designed to rehabilitate and aid the compulsive drinker in arresting his addiction.

Brighton Hospital meets the standards established by the Michigan State Board of Alcoholism and is recommended by that Board.

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One block south of I-96 at Kensington Rd. Exit
four miles east of U. S. 23
Brighton, Michigan
ACademy 7-1211

She simply sits while the party goes on around her, already used to being the girl who is left out. She tries to lose weight—but her emotions won't let her. She becomes irritable and depressed when she doesn't eat, and anxious when she considers her future. So each time she gives up.

"What can I do?" she asks when she visits your office. "How can I ever stay on a diet and lose weight?"

A PARTICULAR COMBINATION OF ACTIONS

Ambar #2 Extentabs®

methamphetamine hydrochloride 15 mg., phenobarbital 64.8 mg. (1 gr.)
(Warning: may be habit forming).

FOR THE NEEDS OF THE DIETING WOMAN

A. H. Robins Co., Inc.
Richmond, Va. 23220
A·H·ROBINS

Ambar is formulated to specifically meet both the physical and emotional needs of the woman who is trying to lose weight. *Methamphetamine hydrochloride* has a powerful suppressant effect on the appetite and also provides a gentle psychic lift to improve mood and encourage activity. The *phenobarbital* component, through its classic calming action, helps control irritability and anxiety, and helps counteract excessive CNS stimulation.

Also available: Ambar #1 Extentabs®—methamphetamine hydrochloride 10 mg., phenobarbital 64.8 mg. (1 gr.) (Warning: may be habit forming).

BRIEF SUMMARY / *Indications:* Ambar suppresses appetite and helps offset emotional reactions to dieting. *Side Effects:* Nervousness or excitement occasionally noted, but usually infrequent at recommended dosages. Slight drowsiness has been reported rarely. *Precautions:* Administer with caution in the presence of cardiovascular disease or hypertension. *Contraindications:* Hypersensitivity to barbiturates or sympathomimetics; patients with advanced renal or hepatic disease. See package insert for further details.

Predicts 2½ Times More Health Worke In Michigan by 1980 . . .

BY ALICE SNELGROVE
OF THE MSMS STAFF

By 1980 in Michigan the number of people employed in medical and related health services will be about two-and-a-half times greater than in 1960, according to the newly-released Michigan Manpower Study. Based on research conducted by the Battelle Memorial Institute in Columbus, Ohio, the study aims to develop estimates of the characteristics of Michigan's labor force through 1980 and serve as an input for educational planning in Michigan.

The report was directed by the Michigan Employment Security Commission and co-sponsored by the Michigan Office of Economic Expansion and the Michigan Division of Vocational Education.

BELIEVED TO BE the first study conducted which applies computer technology to the development of labor supply and demand to obtain a profile of the future labor force, the report provides significant facts about health manpower.

Of all health services, medical and dental technicians will experience the greatest changes with a 220 percent increase in employment from 1960 to 1980. Professional nurses come next, with a projected growth rate of 110 percent. Compared to a total employment growth of 44 percent, the increase of physicians and surgeons will almost double that rate, growing to 90 percent by 1980. Hospital and other attendants will increase approximately 75 percent.

TOTAL EMPLOYMENT is expected to advance 1.9 percent per year between 1960 and 1980, with employment reaching nearly 4 million persons in 1980. Associated with this growth will be an expansion in population from 7,800,000 persons in 1960 to 10,200,000 in 1980.

The report carefully points out that medical services are expected to increase rapidly as the result of recent expansions in Social Security programs. The Medicare program initiated in 1966 is generally assumed to be the first of a series of changes to provide improved medical services to all persons.

THEREFORE, IN addition to serving an ever-growing population with ever-increasing incomes, medical manpower will offer improved and more expensive services to the population as a whole Furthermore, in 1960, 11.9 percent of Michigan's population was age 60 and over. In 1980 the percentage will be 12.5 for persons 60 years of age and older, and the actual number of persons in this classification will be increased to 351,000.

WORD TO THE WISE . . .

The following comments are part of the remarks made by William Hallwright, a prominent surgeon from Aukland, New Zealand, at a recent meeting of the Kent County Medical Society. He was touring the country and went to the Kent meeting as a guest of the KCMS President, James Ferguson, M.D., Grand Rapids.

"No matter how you all personally feel, there is no doubt that socialization of medicine is here to stay and to progress — the essential thing which you will strive to obtain is that form of medical practice which suits the profession and the patients best and which will leave you as much freedom as possible in your dealings with the patient. When such policies are prepared separately by lay and by medical groups, there will be very divergent views of what is ideal.

"Things will usually have to be sacrificed by both sides to obtain agreement, and it is essential for the profession to have their careful, thought-out scheme which must be reasonably acceptable to the other side — BEFORE any plan is put forward by lay bodies.

"Every member of the medical profession is by training an individualist, and there can be few similar groups of people more difficult to weld together, and as you know it is virtually impossible to ever obtain agreement on anything because of divergent interests.

"It takes months, if not years, to prepare such schemes, and it is quite hopeless to begin to formulate one when another has already been presented by a group whose interests are usually to force a maximum of service with a minimum of cost, with little or no thought of the subtle consequences of a good doctor-patient relationship."

In peptic ulcer...
antacid
therapy
with a
new
benefit

CONTAINS A BALANCED COMBINATION OF THE MOST WIDELY USED ANTACIDS— FOR RAPID NEUTRALIZATION. PLUS SIMETHICONE— TO CONTROL THE FACTOR WHICH ANTACIDS ALONE CANNOT INFLUENCE.

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- In Mylanta, aluminum and magnesium hydroxides are balanced to minimize the chance of constipation or laxation and still achieve rapid acid neutralization and pain relief.
- The positive action of simethicone helps relieve the painful gas symptoms which often accompany the peptic ulcer syndrome.
- The nonfatiguing flavor and smooth, nongritty consistency of tablets and liquid encourage continued patient cooperation during long-term therapy.

Composition: Each Mylanta chewable tablet or teaspoonful (5 ml.) of liquid contains: magnesium hydroxide, 200 mg.; aluminum hydroxide, dried gel, 200 mg.; simethicone, 20 mg. **Dosage:** one or two tablets, well chewed or allowed to dissolve in the mouth, or one or two teaspoonfuls of liquid to be taken between meals and at bedtime.

The Stuart Company, Pasadena, California
Division of Atlas Chemical Industries, Inc.

Stuart

Michigan Has Pioneered Camping For Diabetic Children

Going off to camp can be a valuable experience for any youngster — but for the child with diabetes it can be a turning point in his life.

It is especially important that the diabetic child have the experience of participating in normal camp activities because he and his parents will come to realize, perhaps for the first time, that his separation will not interfere with his health. In fact, he may return to them with renewed vigor and optimism.

NOT SO MANY years ago there were no camps for children with diabetes. The very first camp for diabetics in the United States was established near Pontiac, in 1927, by the late Leonard F. C. Wendt, M.D. Many of the specialists in diabetes at that time came to visit and observe his experiment.

In 1954, spark-plugged by Kathryn L. O'Connor, M.D., a small group of physicians decided to revive this pioneering concept. They organized Camp Midicha, whose name incorporates the beginning letters of Michigan Diabetic Children's Association. When the Michigan Diabetes Association was formed in 1957, it assumed sponsorship of the camp with the financial support of the Friends of Camp Midicha.

William E. Rush, M.D., a former Medical Director of Camp Midicha, speaks for many interested in diabetic children when he says: "Camp Midicha's objective is to provide a normal camping experience for children who happen to have diabetes. For the child who lives under necessary health restrictions, this experience in normal living can be a life-long benefit, helping him to control his own health cheerfully and intelligently, but without requiring pampering or perpetual over-dependence on others. The child who comes from an overly-pampered home refuses to eat certain foods because mother never gave me that.

"A CHILD COMING from an undisciplined, too-casual home which fails to provide conditions for optimum diabetic care, may be unwilling to eat at mealtime, then comes to the kitchen in search of food between meals, or may be too casual about getting urine specimens. Both of these children may be brought into a more normal diabetic program by conforming to the gently firm routine at camp."

The camping experience for the diabetic youngster is indeed an opportunity for him to gain self-confidence and to enjoy an excellent recreation program of strenuous physical activities including swimming, horseback riding, boating, ball games, as well as arts and crafts, dancing, and parties.

The medical director this year is John P. Harm, M.D., Detroit. His staff will include two physicians, four registered nurses, and the staff nutritionist of MDA.

CAMP MIDICHA has grown and developed over the years. Today it can accommodate 240 boys and girls. Eligible youngsters between the ages of 8 through 16 can attend one or two ten-day sessions beginning July 16. As in previous years, the campsite is leased. MDA plans to eventually purchase a camp of its own when it can secure the necessary funds. However, for the present, MDA is pleased to have leased the same campsite that it occupied last summer. Located in a beautiful wooded setting beside a lake near Oxford, Michigan, about 40 miles north of Detroit, the Camp provides complete physical and recreational facilities. The camping fee is $60.00 for a ten-day session, but the actual cost of $90.00 is underwritten by MDA. A sliding scale is provided for children whose families cannot cover the complete cost. Camperships are available for children who can pay nothing. No youngster is turned away for financial reasons.

MDA receives many fine letters from youngsters who write, "We diabetic kids can't go to ordinary camps for obvious reasons — diet control, insulin shots, urine tests, and so on. We have fun and good times at Camp Midicha and the people who help us, our doctors, nurses and counselors — are really keen. Most of the year we diabetic kids don't feel much like other kids we know. But for a week or two every year we feel just like other boys and girls. It's good to know you aren't the only one. It's good not to feel different."

Physicians whose patients might benefit from attending Camp Midicha should have them write to the Michigan Diabetes Association, 10737 W. McNichols Road, Detroit 48221. Requests for information and application forms will be promptly answered.

mediscene

May 1-3 – The Initial Management of the Acutely Injured Conference, Rackham Lecture Hall, the University of Michigan, Ann Arbor

May 3 – Michigan Diabetes Association Annual Dinner, Morton House, Grand Rapids

May 7-12 – American Psychiatric Association, Cobo Hall, Detroit

May 12 – MSMS Conference on Medical News Writing, the University of Michigan Medical Center, Ann Arbor

May 17 – Annual Wayne State University Medical School Alumni Day, Detroit

May 17 – Muscle Symposium, Wayne County Medical Society Building, Detroit

May 17-19 – Michigan Public Health Association Conference, Pantlind Hotel, Grand Rapids

May 18-19 – Symposium on Pediatric Trauma (Physical and Psychosocial). Children's Hospital Tenth Annual Clinic Days, David Whitney House, Detroit

May 18 – Michigan Chapter of the American College of Surgeons, the University of Michigan Medical School, Ann Arbor

May 21-27 – Michigan Week

May 24-25 – Michigan Society of Inhalation Therapists Seminar, Pick Fort Shelby Hotel, Detroit

May 25 – MSMS Conference on Medical Aspects of High School Sports, the University of Michigan Medical Center, Ann Arbor

May 31 – The Council, MSMS Headquarters, East Lansing

June 3-4 – Michigan Kidney Foundation Sixth Annual Symposium, University of Michigan Medical Center, Ann Arbor

June 8-10 – 74th Annual Meeting of Michigan Upper Peninsula Medical Society, Escanaba

June 18-22 – 1967 AMA Annual Convention, Jersey City, New Jersey

June 18 – Annual Convention of the Woman's Auxiliary to the American Medical Association, Atlantic City, New Jersey

July 13-15 – The Council, Grand Hotel, Mackinac Island

Aug. 25 – The Council, MSMS Headquarters, East Lansing

Sept. 14-16 – Annual Meeting of the American Thyroid Association, the University of Michigan Medical School, Ann Arbor

Sept. 24-26 – MSMS House of Delegates, Black and Silver Room, Civic Auditorium, Grand Rapids

Sept. 26-27 – MSMS Woman's Auxiliary, Pantlind Hotel, Grand Rapids

Sept. 27 – MSMS Dinner Dance, Pantlind Hotel, Grand Rapids

Sept. 27-29 – MSMS Annual Scientific Session, Civic Auditorium, Grand Rapids

Sept. 27-28 – Michigan State Medical Assistants Society Convention, Mr. President Motel, Grand Rapids

Sept. 29-Oct. 1 – American Academy of Child Psychiatry, the University of Michigan Medical School, Ann Arbor

Oct. 5-7 – Medical School Alumni Reunion, the University of Michigan Medical School, Ann Arbor

Oct. 9-13 – International Conference on Leukemia and Lymphoma, the University of Michigan Medical School, Ann Arbor

Oct. 15-21 – Community Health Week

Oct. 27-28 – Regional Meeting, American College of Physicians, the University of Michigan Medical School, Ann Arbor

Nov. 2 – Southwestern Michigan Clinic Day

Nov. 8 – The Council, MSMS Headquarters, East Lansing

Nov. 15-17 – International Conference on Fertility and Family Planning – A World View, the University of Michigan Medical School, Ann Arbor

Nov. 26-29 – AMA Clinical Convention, Houston

Nov. 26-29 – Conference on Genetics in Medicine, Sponsored by the American College of Physicians, the University of Michigan Medical School, Ann Arbor

Dec. 13 – The Council, MSMS Headquarters, East Lansing

Offer MD Screening At Annual Session In Grand Rapids

The 1967 Annual Session Program Committee plans to include another M.D. Screening Program at next September's meeting. According to the Michigan Heart Association, 17 of the 200 Physicians (8.5 percent) who took tests at the Annual Session in Grand Rapids did not know their electrocardiographs indicated they might have heart disease or have previously suffered a heart attack. One of the physicians informed of an abnormal EKG remembered having chest pains a few months before, but had thought they were a result of indigestion.

Of the 200 participants in the examination, 64 had abnormal EKGs, but 47 of those said they had medical histories of heart trouble or attacks.

DEADLINE FOR THIS BREAKING NEWS WAS APRIL 18, 1967

Urge Members During May to Keep In Touch on Legislative Issues

BY M. A. RILEY
MSMS LEGISLATIVE REPRESENTATIVE

As this issue of *Michigan Medicine* goes to press, the State Legislature is meeting morning, afternoon and evening. More than 150 bills must be considered by the State Senate, and nearly 300 require action in the House of Representatives, before the April 27 deadline, when each house must act on its own bills.

The Legislature is adhering to a schedule calling for final actions to be taken during the week of May 22, six weeks hence.

Since each bill must go through committee referral and debate, and then floor debate and vote in each house, developments in the legislative field come with rapidity.

DURING THE MONTH OF May, therefore, MSMS members interested in legislative matters are urged to keep in close touch with their county medical society officers and legislative committee members, who receive a regular weekly bulletin on the current situation in the State Capitol.

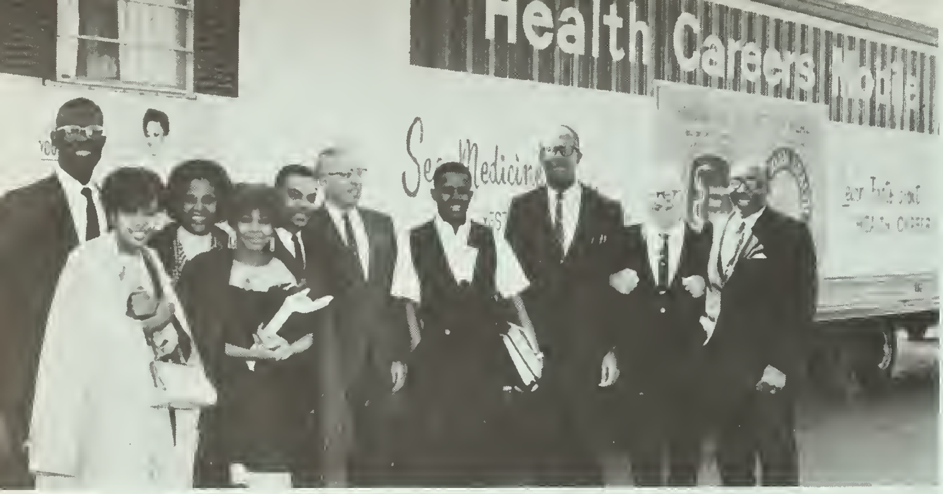
At press-time up for debate and action in the Senate are MSMS proposals to provide immunity for tissue committee members (SB 339), to permit the State Board of Registration in Medicine to accept National Board of Medical Examiners certifications (SB 637), to improve the reporting requirements under the PKU law (SB 274) and to repeal the 1937 Basic Science Law (SB 229). Basic Science Repeal is also before the House of Representatives (HB 2203) along with a bill to declare blood transfusion to be a service and not a sale (HB 2520). The fate of each of these bills must be determined before this issue reaches its readers.

SIMILARLY THE SENATE has before it a bill which would grant legislative recognition of the validity of chiropractic treatment (SB 227), and a bill is before the House of Representatives which would authorize optometrists to perform beyond their skill in eye care (HB 2721). MSMS opposes both bills; both will have received a test vote before April 27.

WSU Alumni Event May 17 To Cite France

One of the highlights of the 1967 Wayne State University Medical Alumni Clinic Day and Reunion, May 17, will be the presentation of a Distinguished Service Citation to C. Jackson France, M.D., Detroit. Doctor France, Associate Professor of Clinical Surgery at WSU, will be cited for his outstanding contributions to the medical profession. In charge of the May 17 event is John M. Pendy, M.D., President of the Alumni Association.

Beginning at 8 a.m., the day will feature seven scientific programs, the annual meeting, complimentary luncheon and banquet. Graduates of the Class of 1917 will be recognized.



Several students are shown with leaders of the Detroit committee to host the Health Careers Mobile during April at the inner-city high schools. The leaders, left to right, are Lionel Swan, M.D.; Mrs. Malcolm West; Detroit City Councilman Nicholas Hood; Eastern High Principal Robert C. Branton; Charles Whitten, M.D.; MSMS Community Director Ralph Wills, and Eastern High School-Community Agent Lucius May.

Detroit Physicians, Wives Host Careers Mobile in Inner-City

"Reception to the Health Careers Mobile in Detroit has been overwhelming."

So reports an official of the Michigan Health Council, which is directing the career recruitment effort this year with the assistance of the MSMS staff.

The Health Careers Mobile, with many new exhibits, spent April in front of the three largest Detroit inner-city high schools—Eastern, Northwestern and Central.

The MHC spokesman reports that "Not only did the nearly 7,500 students tour the Health Careers Mobile but thousands of grade school and junior high students were escorted by teachers and counselors from nearby schools."

Serving as arrangement chairman for the Detroit visitation was L. F. Swan, M.D. Chairman of the hostess committee was Mrs. Malcolm West assisted by Mrs. Addison Prince.

The Health Careers Mobile schedule for the spring and summer will include Fremont, Muskegon, Battle Creek, Hastings, Grand Rapids, Kalamazoo, Berrien Springs and other stops.

Paging: Entries For Art Show

Would all physicians and their wives who paint, draw, sculpt, weave, photograph, or work with ceramics or three-dimensional design please report with their works to the Seventh Annual Doctors and Wives Art Show.

A part of the MSMS Annual Session, the 1967 show is scheduled for September 27-29 at the Pantlind Hotel, Grand Rapids.

This year a special invitation is extended to those physicians and their wives who have never entered. In recent years there have been many of the same artists entering again and again. However, these persons are also encouraged to prepare their works now for this year's show.

Health Department Reminder About Premarital Law

FROM HEALTH DEPARTMENT

Physicians are reminded that a physical examination as well as serology is required in the case of marriage license examinations.

Michigan state law in this regard states that "All persons making application for license to marry shall at any time within 30 days prior to such application be *examined* as to the existence or nonexistence in such person of any syphilis, gonorrhea or chancroid . . . ."

Failure to detect these diseases prior to marriage can result in an unnecessary marital problem, serious problems for the couple and their offspring, and possible legal implications for the physician.

MEDICARE CHECKS HIT NEW RECORD

For the first time in the short history of Medicare Part B Services, Michigan Medical Service recently processed checks for more than one million dollars in one week.

The checks were for 67,049 services for senior citizens. Michigan Medical Service is the fiscal intermediary for the federal government's voluntary medical care portion (Part B) of Medicare.

Blue Shield officials reported that they are able to process more and more claims faster now because the claim forms are more complete.

Learn about MARMP

The June issue of *Michigan Medicine* will carry a special article about the Heart, Cancer and Stroke Program in Michigan. The regional program for Michigan is being developed by the Michigan Association for Regional Medical Programs. A request for planning funds is pending in Washington.

Concerned About Adverse Reactions To Hart Photograph

Editor
Michigan Medicine

The recent publicity achieved by Senator Hart photographed with the dog Straybourne Betts as a "Registered Technologist" has provoked serious adverse reactions from the lay public. Generally, the newspaper articles were unable to include more completely the text of Senator Hart's presentation and the letter from Dr. Robert W. Coon, Chairman of the National Committee for Careers in Medical Technology, which Senator Hart had introduced into the Congressional Record.

Both Senator Hart and Dr. Coon clearly indicated that most Medical Technologists are very well educated, highly skilled, strongly conscientious people doing an excellent job in laboratory procedures. It would be a near tragedy and a great disservice if the medical profession and the public at large were to be allowed to retain the impression that most laboratory work is so poorly done by such ill qualified personnel as exemplified by the dog Straybourne Betts. His certification is by two organizations which, to the best of my knowledge, have never been approved nor supported by the medical profession.

Senator Hart and Dr. Coon emphasize that Registered Technologists, specifically designated MT (ASCP), have three years of college education over a broad biological background, plus a year long, on-the-job, internship in specifically approved Hospital Laboratories directed by Pathologists. Passing a National examination after the internship is required for registration as an MT (ASCP).

It is imperative that these well qualified Technologists be sharply and clearly differentiated from those without appropriate training, supervision, examination, or registration.

I sincerely hope that this information can be printed so that any misunderstanding the public may have developed can be immediately and thoroughly corrected.

Sincerely yours,
John F. Dunkel, M.D.
Chairman
Public Relations Committee
Michigan Society of Pathologists
Lansing, Michigan

Help Sell Michigan Week

Reports from county medical societies indicate that more physicians than ever are serving on local Michigan Week committees. By so doing they promote not only Michigan, but the profession of medicine as well.

Michigan Week — featured on the cover of this issue — will be observed May 21-27.

MSMS officials have urged doctors to help in this promotional effort. Michigan Week provides a two-way opportunity: Michigan physicians can promote their state by promoting their profession, and by promoting their profession they promote Michigan.

Each physician can speak for Michigan in his practice, hospital, professional organizations and associations. Wherever he travels and to anyone he meets, he can take the opportunity to say that Michigan is the "Health Capital of the World."

OUTSTANDING SERVICE to the 1966 Michigan Week project was recently recognized by the Greater Michigan Foundation. Governor Romney, in a special joint session of the Legislature, presented John Rodger, M.D., Bellaire, a Volunteer Leadership award for 1966. One of 10 award winners chosen from more than 200 persons nominated by regional and county Michigan Week chairmen, Doctor Rodger was selected for his leadership in educational and social programs in northwestern Michigan.

Invite MSMS Members To APA Convention

Many MSMS members are busy helping to host the 123rd national convention of the American Psychiatric Association at Cobo Hall, Detroit, May 8-12. And many members will appear on the program.

All MSMS members are cordially invited to attend and participate in this annual meeting. Information about the program may be obtained from Peter A. Martin, M.D., Detroit, Chairman of the local arrangements committee.

Joseph N. Schaeffer, M.D., Detroit, was the first physician to ever receive a Governor's Citation for Meritorious Service to the Handicapped during a recent dinner at Michigan State University. Mrs. Romney presented the citation to Doctor Schaeffer and two other honorees. Doctor Schaeffer is director of the Rehabilitation Institute of Detroit.

Mark Your Calendar Now . . .

102nd Annual Scientific Session
Michigan State Medical Society
Grand Rapids, September 27-28-29

15 PG Programs Set for April

Physicians in 15 communities will participate during May in the 1967 MSMS Spring Postgraduate Courses, arranged by the MSMS Committee on Postgraduate Medical Education.

Once again the Michigan Department of Health and the Medical Schools at Wayne State and The University of Michigan are cooperating.

"It is important that physicians attend so that new information and discoveries can be put into practice," stresses H. A. Towsley, M.D., Chairman.

The schedule for May includes: Lower Peninsula — Battle Creek, May 2; Cadillac, May 25; Holland, May 5; Lansing, May 16; Midland, May 11; Muskegon, May 17; Niles, May 16; and Upper Peninsula — Escanaba, May 16; Houghton, May 15; Iron Mountain, May 17; Ironwood, May 16; Manistique, May 16; Marquette, May 18; Menominee, May 17, and Sault Ste. Marie, May 15.

Programs were held in April at Alpena, Grayling and Petoskey.

MDPH to Start Health Statistics Center

Robert Lewis, Ph.D., Professor of Biostatistics, Department of Tropical Medicine and Public Health, School of Medicine, Tulane University, New Orleans, Louisiana, becomes the Chief of the Michigan Center for Health Statistics beginning June 15, 1967.

Pollard Chosen Next ACP Leader

H. Marvin Pollard, M.D., Professor of Internal Medicine at the University of Michigan Medical School, was designated president-elect of the American College of Physicians at the recent annual session in San Francisco.

Affiliated with the U-M Medical School faculty since 1933, Doctor Pollard was president of the American Gastroenterological Association (1958-59), the American Gastroscopic Society (1953-54), and the Washtenaw County Medical Society (1951-52). He was editor of the *American Gastroscopic Bulletin* (1946-49).

Watchdog

In his recent Washington Report Newsletter to his constituents, U.S. Representative Marvin L. Esch of the Second District, dealt with the income tax and the federal budget.

In part, he wrote:

"Surely government must provide and pay for the basic services to meet an ever-expanding population and economy. Yet we must not continually look to government to solve all our problems. There are those of us who believe that there must be an increased utilization of the private sector's responsibility in meeting the needs of our changing communities.

"Those of you burning the midnight oil to meet the April 15th deadline can be assured that there are those of us here who constantly question current fiscal policies, who feel a mandate to cut nonessential spending and who are attempting to involve the private sector in solving our nation's ills."

Churches Push Family Project

"Plan joint programs with the medical society and the churches during Family Week, May 7-14."

Thousands of Michigan ministers and lay church leaders received that suggestion recently from the Michigan Council of Churches. The state council further explained in its April *Spot News* bulletin that: "A state-wide educational campaign emphasizing the need for family life education in the Michigan educational system will be spearheaded by the Michigan State Medical Society during April and May.

The MSMS effort has coordinated the efforts of churches, schools, parent groups, youth councils and other interested groups. James Harryman, M.D., Muskegon, is chairman of the sponsoring committee.

Comprehensive Health Planning Is Topic for Article in June

A detailed article will appear in the June issue about PL 88-749, the Comprehensive Health Planning and Public Health Services Amendments of 1966.

The MSMS Council has already transmitted to the Executive Office a recommendation that an interdepartmental agency should be selected and to be a "Plan for Planning Committee" as the best approach for proper implementation in Michigan of this law.

Robert J. Mason, M.D., Chairman of The Council, has stated that "MSMS considers PL 89-749 to be potentially the single most significant piece of health legislation enacted by Congress. Its provisions are so extensive and inclusive as to have vastly important implications to all aspects of the health care of the people of Michigan."

Time to Write Washington On Social Security Amendments

Michigan physicians, their wives and friends are urged to write to Michigan Congresswoman Martha W. Griffiths, a member of the House Ways and Means Committee, to voice their views on House Resolution 5710, "Social Security Amendments of 1967."

The appeal to write to Congresswoman Griffiths at once is made by Robert J. Mason, M.D., Chairman of The Council. Doctor Mason has suggested that physicians may wish to make two important points:

(1) That Title XIX should permit payment to be made for physicians' services when an itemized bill is offered either by the physician or the patient at the choice of the physician.

"This method of payment preserves the traditional physician-patient relationship, protecting both patient and physician from third-party invasion by government. The intent of Title XIX was to put all people in the mainstream of health care, giving them cash to pay their own way. The patient has a right to be treated as a self-respecting citizen, not as a second-class citizen. This system of payment does carry the risk of non-payment of some bills, but most physicians are willing to write off the unpaid bills to preserve their freedom. Title XIX goes beyond a pure medical indigency program. The present program could conceivably cover over one-third of the program."

(2) That the proposal to include the disabled, below the age of 65, in the Medicare program not be adopted.

"Medicare benefits should not be extended to those below age 65. Medicare's proponents said repeatedly that it was just a program for those 65 and over. Now, before Medicare has been in operation a year, they are ignoring their previous statements by proposing inclusion of a segment of the population under 65."

Doctor Mason stressed that already a significant number of disabled persons, particularly those receiving the smallest disability benefits and most in need of help, already are receiving or are eligible for public assistance programs — Aid to Families with Dependent Children, Aid to the Blind, and Aid to the Permanently and Totally Disabled. As soon as a state implements Title XIX, all persons on or eligible for those three public assistance programs become eligible for Title XIX assistance in meeting medical expenses which, as of July 1, 1967, will include payment for the reasonable cost of hospital services plus payment for physician services, nursing home care, hospital outpatient services, and diagnostic and X-ray laboratory services.

The AMA made its official testimony on April 4 before the House Ways and Means Committee.

"Because of the timetable for HR 5710," Doctor Mason said, "it is important for physicians to write their letters now. When the House Ways and Means Committee reports the bill out, it will go to the Rules Committee, then to the floor of the House. After House action, it goes to the Senate to be considered by the Senate Finance Committee, then to the Senate for vote, then back to the Conference Committee."

Doctor Mason said there are many reasons why "we should strongly oppose further expansion of Medicare."

"Basically," he noted, "it is a bad law — extremely costly, difficult to administer, the degree of government control is not compatible with good medicine, and it taxes workers and employers to finance care for millions of people who are self-supporting."

M/M QUOTED IN TEXT

An article from *Michigan Medicine* will be quoted in a new textbook, *Sensory Deprivation,* edited by J. P. Zubek. The article is "Cataract Deliriums: A Complete Report of the Cases of Cataract Delirium Occurring in the Ophthalmologic Clinic of the University of Michigan between the Years 1904 and 1917," written by Morton E. Brownell, published in 1917.

Published by Appleton-Century-Crofts, *Sensory Deprivation* is designed for use as a handbook or textbook in colleges and universities throughout the world.

Robert J. Mason, M.D., presides as Chairman of The MSMS Council.

Extract of Council Minutes, March 8

ABOVE: Vice-Chairman Ross V. Taylor, M.D., right, listens as Councilor Harold F. Falls, M.D., studies a report. BELOW: Councilor Sidney Adler, M.D., standing, right, discusses an issue; with left to right, Councilor Edward H. Rodda, M.D.; Councilor John R. Pedden, M.D.; and Scientific Editor George H. Lowrey, M.D.

The Council appointed Winslow G. Fox, M.D., Ann Arbor, as Chairman of the MSMS Committee on Medicine and Religion.

Reappointed were R. W. Teed, M.D., Ann Arbor, and R. E. Rice, M.D., Greenville, as 1967 MSMS representatives to the Michigan Health Council.

The Council also created a liaison committee with the Michigan Welfare League to explore future liaison between MSMS and the League. Members of the Committee are Doctors C. Allen Payne, Bradley M. Harris, and Brooker L. Masters, with Otto K. Engelke, as Advisor.

The Council appointed physician representatives to the East Central District Health Facilities Planning Council and the Southwestern Michigan Hospital Planning Council.

The Council discussed with John M. Wellman, M.D., Chairman of the Board of Michigan Medical Service, higher payment levels for special medical care and consultation, 1967 Blue Shield projections, ad hoc committee report on evaluation of factors affecting Blue Shield, and matters having to do with the fiscal intermediary's role in Medicare and Medicaid.

At the request of The Council, the Director of the Department of Social Services, Bernard M. Houston, discussed matters having to do with Title XIX, Medicare, and answered several questions regarding the full implementation of the law, reimbursement levels for nursing homes, and a full discussion on proposals to simplify billing systems.

In response to a request from the Michigan Heart Association, The Council expressed its support and approval of a proposed television educational program covering several counties in the Detroit area utilizing several institutions and physicians.

The Council also received letters and resolutions objecting to recent efforts of Michigan Medical Service to determine doctors' specialty classifications. The Council agreed to discuss this matter more fully with representatives of component societies and the Academy of General Practice at its April meeting.

Many committee minutes are studied by, left to right, Speaker of the House James J. Lightbody, M.D.; Councilor Don Marshall, M.D., and Councilor Harvey C. Hansen, M.D. (Photos by Dick Best)

In response to a request from the American Medical Association, The Council agreed to survey retired physicians in Michigan who might be interested in opportunities for part-time physician employment or in return to limited practice or service and to submit these names to the AMA Physicians Placement Service.

Because of increasing problems regarding malpractice insurance rates and coverage for physicians, The Council recommended immediate liaison with companies involved and referred the matter for prompt action to the House of Delegates Committee on Professional Liability Insurance. MSMS will promptly express its concern and displeasure with the insurance companies' actions and request that they outline their future plans and report on the situation which led to their current actions.

To provide an increasing flow of information to delegates and component society officers, The Council authorized a workshop for delegates, alternate delegates, and component society officers for April or May, at which time the challenges facing medicine could be discussed. Subsequently, the opinion of constituents could be obtained so that the delegates could go to the House meeting more adequately prepared. This workshop will supplement the regional meetings with component society officers and also the Councilor Conference which again will be held in late August and September, immediately prior to the House of Delegates meeting.

The Council received progress reports on plans for the conference on medical news reporting and the scientific program for the Annual Session.

Councilor Ralph R. Cooper, M.D., gives a report; listening are Vice Speaker Louis F. Hayes, M.D., far left; Councilor Milton R. Weed, M.D., and Councilor A. Carl Stander, M.D., far right.

Listening to a debate are Councilor Brooker L. Masters, M.D., left, and Councilor John J. Coury, M.D.

The Publication Committee reported to The Council that advertising in *Michigan Medicine* for April had increased to its highest point in several years.

The Council adopted a statement of policy re procedures of MSMS committees meeting with legislators as follows:

"All legislative efforts and contacts of specialty groups *should* be, and of committees of MSMS *must* be, coordinated through the MSMS Legal Affairs Committee."

The Council approved detailed recommendations from the Maternal Health Committee regarding the more efficient use of obstetric beds in Michigan hospitals, which action will be transmitted officially to the Michigan Department of Public Health, which cooperated with the Committee in the development of the recommendations.

Upon request of the Committee on International Health, The Council approved a recommendation to suggest that the Michigan Delegates to the AMA House of Delegates urge the federal government to increase its foreign aid for medical care to the civilian population of South Vietnam.

This council report covers only the highlights of the March meeting. The complete official report of Council proceedings is on file in the Executive Office of MSMS, and copies have been sent to all members of The Council, the MSMS House of Delegates, and presidents and secretaries of each county medical society.

Checking the financial report are Treasurer John R. Ylvisaker, M.D., left, and MSMS President C. Allen Payne, M.D.

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MSMS COMMITTEE HELPS ADVISE ON BLIND CASES

Robert Blackhurst, M.D., Chairman of the MSMS Committee on Eye Care, reports that his Committee is now working in an advisory capacity to the State Department of Social Services, Office of Services for the Blind. The first meeting of the Committee on Eye Care for this purpose was held in the MSMS Headquarters, February 1. At that time the Committee met with Edward Fitting, Supervisor of the State Office of Services for the Blind, who reviewed his organization's current problems and solicited the Committee's advice. Willard Klunzinger, M.D., has acted in the capacity of State Supervising Ophthalmologist since 1945, and, due to the pressures of his private practice, he felt he could not devote the time necessary to carry on this additional responsibility.

Justin Sleight, M.D., became State Supervising Ophthalmologist on April 1. In this position Doctor Sleight will review all eye examinations supplied to the Department of Social Services for determining eligibility for public assistance in the Aid to the Blind category and for rehabilitation under the Office of Services for the Blind. The latter office is primarily concerned in providing the services to help blind individuals become economically self-sufficient.

Blind-services rehabilitation counselors are now located in every county in Michigan, and physicians may contact the local county department of social services for referral information.

"MORE DOCTORS WANTED" IS COMMON HEADLINE

MSMS is using news releases, TV news spots, and radio tapes to help interest young people in medical careers and to help explain to the public the need for more doctors.

For example, here are some newspaper headlines that have appeared recently on some of the MSMS news releases:

Michigan Medical Men To Up Number Of Doctors And Aides — St. Joseph County Observer

Career Opportunities In Medicine Open — Grandville Star

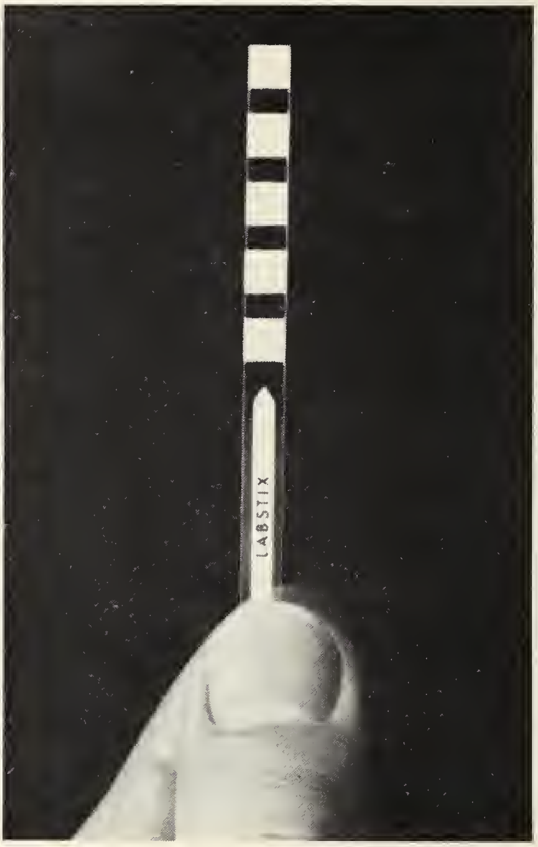
Medical Careers Needed — Brooklyn Exponent

State Medicos Drive For More Physicians — Whitehall Forum

Issue Call For Physicians — Detroit News

Will Try To Recruit More Medical Trainees — Manistee County Pioneer Press

Medical Society Plans Increase In State — New Buffalo Times.



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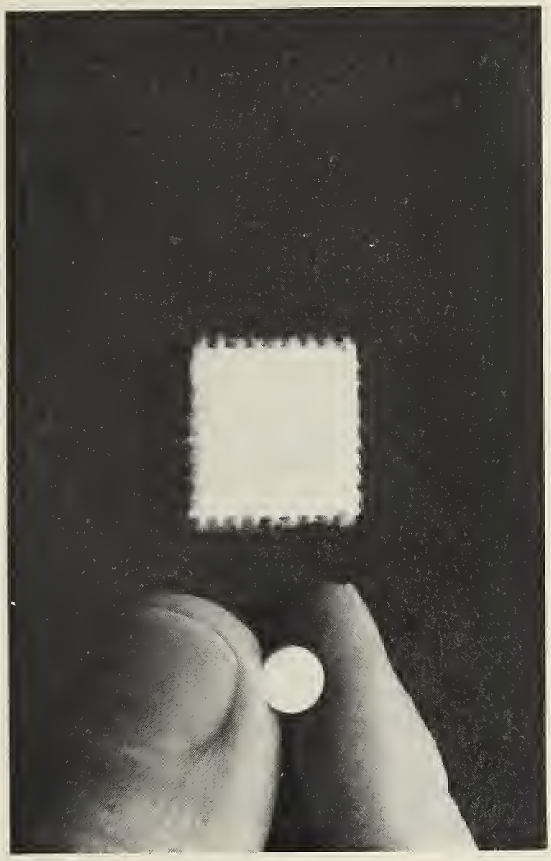

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"Horizons Unlimited" Is Well Received

"The AMA Horizons Unlimited were received with great interest by the boys in our Hospital Explorer Post 89," reports Gordon Manson, M.D. "Thanks for sending me the extra books. I must say that it is an excellent and informative publication for a young person," he wrote.

The Explorer Post was started in 1966 at Henry Ford Hospital.

Small supplies of the AMA career handbook are available from MSMS, 120 West Saginaw, East Lansing 48823.

Build Hearing-Speech Rehabilitation Center

A $681,000 hearing and speech rehabilitation center will be erected at Michigan State University by mid-1968 to provide therapy for persons with hearing and voice disorders.

Professor Herbert Oyer, Chairman of the Department of Speech, says the new rehabilitation center will be built on a matching fund basis. The MSU Board of Trustees has accepted a grant of $324,000 from the United States Public Health Service.

CALHOUN CAREER PROGRAMS HONOR CAMPBELL, HEYSER

The 1967 Health Careers Day and Cancer Educational Program at Battle Creek, April 4, were dedicated to Richard J. Campbell, M.D., and Mrs. Marion Heyser, both active in ACS work there. Max E. Dodds, M.D., Flint, MSMS Cancer Committee Chairman, spoke in the afternoon to the students on "Health Careers Need You" and to the Calhoun County Society meeting in the evening on "The Importance of the Cancer Program in Our Hospitals."

HEALTH COUNCIL DIRECTORY HAS VALUABLE FILM LIST

Copies of the current Michigan Health Council *Directory* are still available from the Health Council, Box 431, East Lansing 48823.

The *Directory* contains, in its 160 pages, detailed information regarding more than 140 health, welfare, and safety associations, societies, and foundations. In addition, there is a special 40-page directory of health, safety, and career films that are available free for showing to civic groups.

Prices for the *Directory* are $3.50 for single copies, three copies for $10, and ten copies for $30. Special prices are available for quantity purchases.

Attention Called To Issues Affecting Practice of Medicine

The attention of Michigan physicians is focused by D. L. Kessler, M.D., Chairman of the MSMS Committee on Medical Socio-Economics, on some issues that will affect the practice of medicine.

He outlined some of these issues at the last meeting of his Committee, and the minutes were carefully studied by The Council at its March meeting. A member of the Publication Committee has suggested that all MSMS members would be interested in reading this portion of the Committee minutes.

The comments were offered by Doctor Kessler after participating in the 1967 AMA Congress on Socio-Economics of Health Care.

Doctor Kessler suggested that:

"(1) Organized medicine must offer leadership in identifying problems where they exist in the Health Care field and in developing workable solutions or it will continue to be simply reacting to proposals of others.

"(2) More effective use must be made of supportive medical manpower if the medical profession is going to meet the increasing health care demands of the American people. Physicians should re-examine their professional activities and determine those which must be done by physicians and those which could be done by others without sacrificing quality of care.

"(3) More and more the Community Hospital will take on the role of Community Medical Center. People are transferring some medical care demands from the physician's office to the Hospital Center. Physicians must take the leadership in influencing the organization and operation of hospital emergency rooms and out-patient departments.

"(4) Physicians must satisfy the increasing demands of the public for assurance of high quality medical care. Hospital medical staffs must establish more effective utilization review procedures.

"(5) Future hospital licensing and franchising legislation will include recommendations arising from community-wide planning groups. Physicians must participate in Community Health Facility Planning Councils if medicine's point of view is to be given proper recognition.

"(6) Since recent court cases are holding hospital governing boards ultimately responsible for patient care and professional standards, it seems desirable that physicians take a more active part in the deliberations of hospital boards.

"(7) Physicians must take a more active leadership role in all community activities pertaining to health and medical care so that communities will make wiser decisions affecting health care.

"(8) The tenor and tone of the Socio-Economic Congress was directed toward the dynamics of our modern American society. The words "change, challenge and evolving" were used by many speakers. The unresolved question is what role the physician will play in determining the direction of change in the milieu of medical socio-economics."

CLINICAL PHARMACOLOGY SUPPORT OFFERED BY PMA

An awards program to stimulate teaching, training, and research in clinical pharmacology has been established by the Pharmaceutical Manufacturers Association Foundation.

The PMA Foundation awards will be offered annually to medical schools for salary support of full-time, junior faculty positions in clinical pharmacology.

Applicants should have at least one year of experience in a research training program related to the area of clinical pharmacology and should indicate "a strong determination for a full-time career in clinical pharmacology." The awards are for two years each, but may be extended for an additional two years.

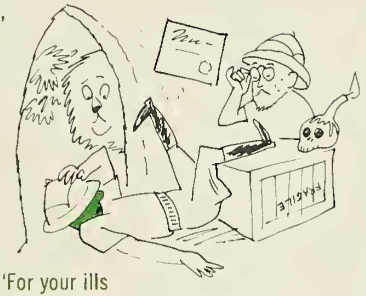
Details are available from the PMA Foundation, 1155 15th Street, N.W., Washington, D.C. 20005.

DETROIT DOCTOR COMPILES BOOK OF HIS POEMS

Carlton F. Brown, M.D., Detroit, is the author of a newly published book, *Behind My Bedroom Door.* According to the jacket blurb, the collection of poems are "down-to-earth descriptions of experiences that could be yours as well as his. He writes of happiness and sorrow, joy and frustration, worry and humor. Many of his lines pay tribute to nature, a subject which greatly fascinates him. He also devotes much space to people, with their ever-changing emotions."

The book is the outgrowth of its title poem, "Behind My Bedroom Door," composed in 1935, which represents the comforting retreat found in one's own bedroom when life's pressures seem overwhelming.

"Livingston... vertigo is my doom!"
Cried Stanley in his doctor's room.



Said the doc, "For your ills
I've got just the pills."

Said Stan,
"Antivert, I presume."

Antivert® tablets/syrup stops vertigo

(meclizine HCl, niacin)

Tablets: (meclizine HCl 12.5 mg. and niacin 50 mg.) Syrup: (each 5 cc. teaspoonful contains meclizine HCl 6.25 mg. and niacin 25 mg.)

Most widely prescribed anti-vertigo agent[1]
Complete to moderate relief of symptoms in 9 out of 10 patients[2]

Antivert, the leading anti-vertigo product,[1] combines meclizine HCl, an outstanding drug for treatment of vestibular dysfunction, with niacin, a drug of choice for prompt vasodilation. Prescribe Antivert for your patients with vertigo, Meniere's syndrome and allied disorders.

Precautions and contraindications: Frequent, short-lived reactions include: cutaneous flushing, sensations of warmth, tingling and itching, burning of skin, increased gastrointestinal motility, and sebaceous gland activity. In explaining these reactions to the patient, it is suggested that they be regarded as a desirable physiological sign that the niacin is carrying out its intended function of vasodilation. Because of this vasodilation, severe hypotension and hemorrhage are obvious contraindications to Antivert therapy. Although the incidence of drowsiness and other atropine-like side effects such as dry mouth and blurring of vision is low, the physician should alert the patient to the need for due precautions when engaging in activities where alertness is mandatory. **Use in women of childbearing age:** A review of available animal data reveals that meclizine exerts a teratogenic response in the rat. In one study a dose of 50 mg./kg./day (50 times the maximum recommended human dose) produced cleft palate in 2 of 87 fetuses when administered to the rat at critical times during the first 15 days of gestation. At doses of 125 mg./kg./day, meclizine will produce 100% incidence of cleft palate in the rat. At doses of 25 mg./kg./day, decreased calcification of the vertebrae and relative shortening of the limbs were also produced in the rat, but experts disagree as to whether this is a teratogenic response. While available clinical data are inconclusive, scientific experts are of the opinion that this drug may possess a potential for adverse effects on the human fetus. Consequently, consideration should be given to initial use of a nonphenothiazine agent that is not suspected of having a teratogenic potential. In any case, the dosage and duration of treatment should be kept to a minimum. **Dosage:** One tablet or one to two teaspoonfuls (5-10 cc.) t.i.d. just before meals. Specific requirements for individual patients should be determined by the physician. **Supplied:** Tablets in bottles of 100 and 500. Syrup in pint bottles. RX only.

References: 1. Based on 1966 data from independent physicians' market survey organization. 2. Scal, J. C.: Eye Ear Nose & Throat Month. **38**:738 (Sept.) 1959.

Neobon®

geriatric supplement

helps keep them 'on the go'

Each capsule contains:

(1) **Vitamins and Minerals**	
Vitamin A (acetate)	2000 U.S.P. units
Vitamin D (ergocalciferol, U.S.P.)	200 U.S.P. units
Vitamin B_1 (thiamine mononitrate, U.S.P.)	0.5 mg.
Vitamin B_2 (riboflavin, U.S.P.)	0.5 mg.
Vitamin B_6 (pyridoxine HCl, U.S.P.)	0.5 mg.
Niacinamide, U.S.P.	50 mg.
Calcium pantothenate, U.S.P.	5 mg.
Vitamin E (di-alpha tocopheryl acetate)	5 I.U.
Rutin	5 mg.
Cobalt (from cobalt sulfate)	0.033 mg.
Molybdenum (from sodium molybdate)	0.066 mg.
Copper (from copper sulfate)	0.33 mg.
Manganese (from manganese sulfate)	0.33 mg.
Magnesium (from magnesium sulfate)	2 mg.
Iodine (from potassium iodide)	0.05 mg.
Potassium (from potassium sulfate)	1.66 mg.
Zinc (from zinc sulfate)	0.4 mg.
(2) **Hematopoietic Factors**	
Iron (from ferrous sulfate)	3.40 mg.
Vitamin B_{12} (cobalamin concentrate, N.F., as Stablets®)	1 mcg.
Vitamin C (ascorbic acid, U.S.P.)	50 mg.
(3) **Digestive Enzyme**	
Pancreatic substance*	50 mg.
(4) **Gonadal Hormones**	
Methyltestosterone, N.F.	1.0 mg.
Ethinyl Estradiol, U.S.P.	0.006 mg.
(5) **Amino Acids**	
L-lysine (monohydrochloride)	50 mg.
L-Glutamic acid	30 mg.

*Enzymatically active defatted material obtained from 250 mg. of whole fresh pancreas.

For older adults who require it, daily supplementation with Neobon can help overcome decreases in endogenous gonadal hormone production, as well as deficiencies of iron, vitamins and other nutritional factors. In a single convenient capsule, Neobon provides vitamins, minerals, gonadal hormones, hematopoietic factors, digestive enzymes, and amino acids—all selected for adjunctive therapeutic value in the geriatric syndrome. For example, one of the gonadal hormones in Neobon is ethinyl estradiol. It is more slowly metabolized in the body than natural estrogens or their esters.

Precautions: Contraindicated in patients in whom estrogen or androgen therapy should not be used, as in carcinoma of the breast or prostate.

Dosage: One capsule, t.i.d. with meals, or as directed by physician.

Supplied: Bottles of 60 capsules. Rx only.

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NEW YORK, N.Y. 10017

Against these three major pathogens…
Pneumococci
Penicillin-Sensitive Staphylococci
Beta-Hemolytic Streptococci

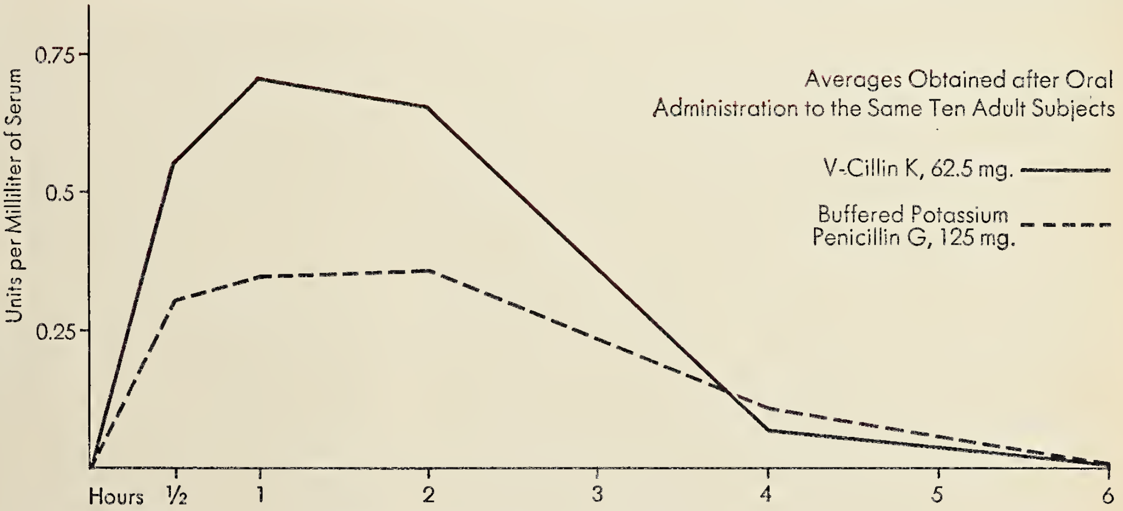
V-Cillin K® provides dependable oral antibacterial activity

because it combines a high degree of in-vitro activity...

	Staph.Aureus (Penicillin-Sensitive) MIC (mcg./ml.)		Streptococcus, Group A MIC (mcg./ml.)		Diplococcus Pneumoniae MIC (mcg./ml.)	
Antibiotic	Median	Range	Median	Range	Median	Range
Penicillin V	0.02	0.02-0.04	0.02	0.003-0.4	0.01	0.005-0.2
Penicillin G	0.02	0.005-1.6	0.005	0.002-0.2	0.02	0.01-0.1
Methicillin	1.6	0.4-6.3	0.2	0.1-0.4	0.2	0.1-1.6
Oxacillin	0.4	0.1-3.1	0.04	0.02-0.4	0.1	0.04-0.8
Cloxacillin	0.2	0.2-0.8	0.1	0.1-0.8	—	—
Nafcillin	0.4	0.2-0.8	0.04	0.02-0.1	0.02	0.02-0.2
Ampicillin	0.2	0.1-0.8	0.02	0.01-0.04	0.02	0.01-0.04

Adapted from Klein, J. O., and Finland, M.: New England J. Med.,269:1019, 1963.

with high blood levels, even in the presence of food



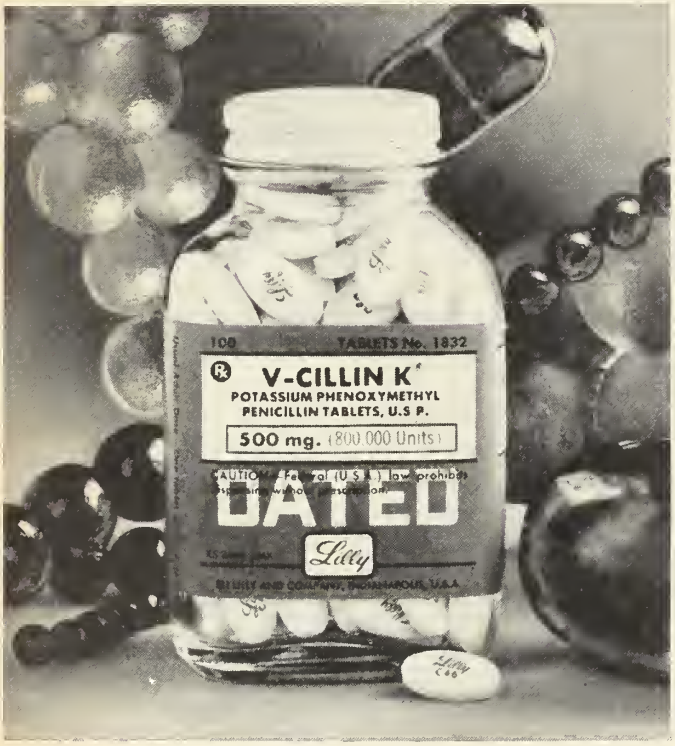
Adapted from Griffith, R. S., and Black, H. R.: Current Ther. Res., 6:253, 1964.

V-Cillin K® Lilly

Potassium Phenoxymethyl Penicillin

(See next page for prescribing information

New 500 mg. tablets...a more convenient way to give high doses



Description: V-Cillin K is the potassium salt of V-Cillin® (phenoxymethyl penicillin, Lilly). This chemically improved form combines acid stability with immediate solubility and rapid absorption. Higher serum levels are obtained more rapidly with this penicillin than with equal oral doses of penicillin G. The higher serum levels and acid stability of V-Cillin K moke it a more dependable penicillin for oral use.

V-Cillin K, Pediatric, is on oral solution of clinically proved V-Cillin K in teaspoon dosage form. When mixed as directed, each 5 cc. (approximately one teaspoonful) will contain 125 mg. (200,000 units) phenoxymethyl penicillin as the potassium salt.

Indications: V-Cillin K has been shown to be effective in the treatment of streptococcus, pneumococcus, and gonococcus infections as well as infections caused by sensitive strains of staphylococci. It may be used for the prophyloxis of streptococcus infections in patients with a history of rheumatic fever and for the prevention of bacterial endocarditis after tonsillectomy and tooth extraction in those patients with a history of rheumatic fever or congenital heart disease.

Contraindication: V-Cillin K should not be administered to a patient with a history of penicillin hypersensitivity.

Warnings: In rare instances, the use of penicillin may cause acute onaphylaxis which may prove fatal unless promptly controlled. This type of reaction appears more frequently in patients with a history of sensitivity reactions to penicillin and in those with bronchial asthma or other allergies. Resuscitative drugs should be readily available for emergency administration. These include epinephrine and pressor drugs (as well as oxygen for inhalation) for relief of immediate allergic manifestations and antihistamines and corticosteroids for delayed effects.

Precautions: V-Cillin K should be used cautiously, if at all, in a patient with a strongly positive history of allergy.

In prolonged therapy with penicillin, and particularly with high parenteral dosage schedules, frequent evaluation of the renal and hematopoietic systems is recommended.

In suspected staphylococcus infections, proper laboratory studies (including sensitivity tests) should be performed.

The use of penicillin may be associated with the overgrowth of pencillin-insensitive organisms. In such cases, its administration should be discontinued, and appropriate measures should be taken.

Adverse Reactions: Although serious allergic reactions are much less common with administration of oral penicillin than with intramuscular forms, manifestations of penicillin allergy may occur.

Penicillin is a substance of low toxicity, but it does possess a significant index of sensitization. The following hypersensitivity reactions associated with the use of penicillin have been reported: skin rashes ranging from maculopapular eruptions to exfoliative dermatitis; urticaria; and reactions resembling serum sickness, including chills, fever, edema, arthralgia, and prostration. Severe and often fatal anaphylaxis has occurred (see Warnings). Hemolytic anemia, leukopenia, thrombocytopenia, and nephropathy are rarely observed side-effects and are usually associated with high parenteral dosage.

Administration and Dosage: For Tablets V-Cillin K and for V-Cillin K, Pediatric, the usual dosage ranges from 125 mg. (200,000 units) three times a day to 500 mg. (800,000 units) every four hours. For infants, the daily dosage may be 50 mg. per Kg. of body weight divided into three doses.

Beta-hemolytic streptococcus infections without associated bacteremia may be treated with 200,000 to 400,0000 units three times a day. Therapy should be continued for a minimum of ten days to prevent development of rheumatic fever and/or other serious complications. Dosage for routine streptococcus prophylaxis in patients with a history of rheumatic fever or congenital heart disease may be 200,000 units once or twice daily. When such patients undergo tonsillectomy, tooth extraction, or other minor surgery, the prophylactic dose should be 500,000 units every six hours given two days prior to surgery and for two days postoperatively. If oral medication is not feasible on the day of surgery, parenteral therapy should be considered. Mild to moderately severe pneumococcus pneumonia has been treated effectively with 250 mg. every six hours.

In staphylococcus infections, 400,000 units or more should be given every six to eight hours in conjunction with indicated surgical procedures.

For gonorrhea in males, 500 mg. (800,000 units) every four hours for three doses may be employed; in females, 500 mg. every four hours for six doses are recommended. Patients with a suspected lesion of syphilis should have a dark-field examination before receiving penicillin and monthly serologic tests for a minimum of three months.

How Supplied: Tablets V-Cillin K, U.S.P., 125 mg. (200,000 units), in bottles of 50 and 100; and 250 mg. (400,0000 units) and 500 mg. (800,000 units), in bottles of 24 and 100.

V-Cillin K, Pediatric, for Oral Solution, 125 mg. (200,0000 units) per 5 cc. of solution, in 40, 80, and 150-cc.-size packages. [011867]

Additional information available to physicians upon request. Eli Lilly and Company, Indianapolis, Indiana 46206.

Lilly

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Some photos from the last MDPAC meeting appeared in the March News Extra. Here are some others. Listening to a discussion, left to right, are MDPAC Board Member Everette Gustafson, M.D., Pontiac; AMA Field Representative Jack Brown, Chicago; and MDPAC Board Member Reginald H. Ernst, M.D., Detroit.

MDPAC Continues Plea for More Members

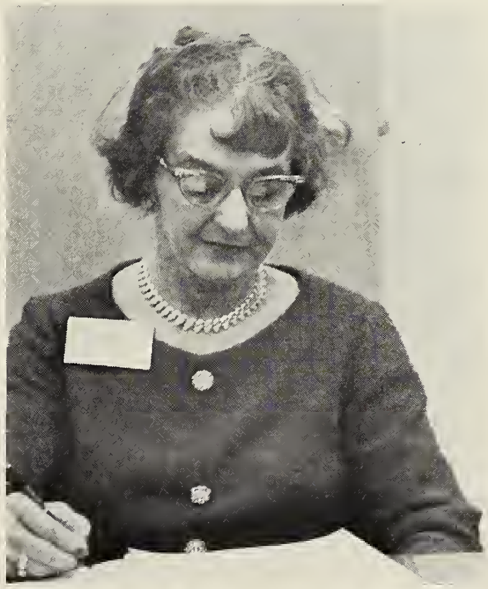
"We must recruit and train and work to build a stronger organization for the 1968 elections."

That appeal is made by Vernon V. Bass, M.D., Chairman, MDPAC, in his recent spring membership letter to Michigan physicians.

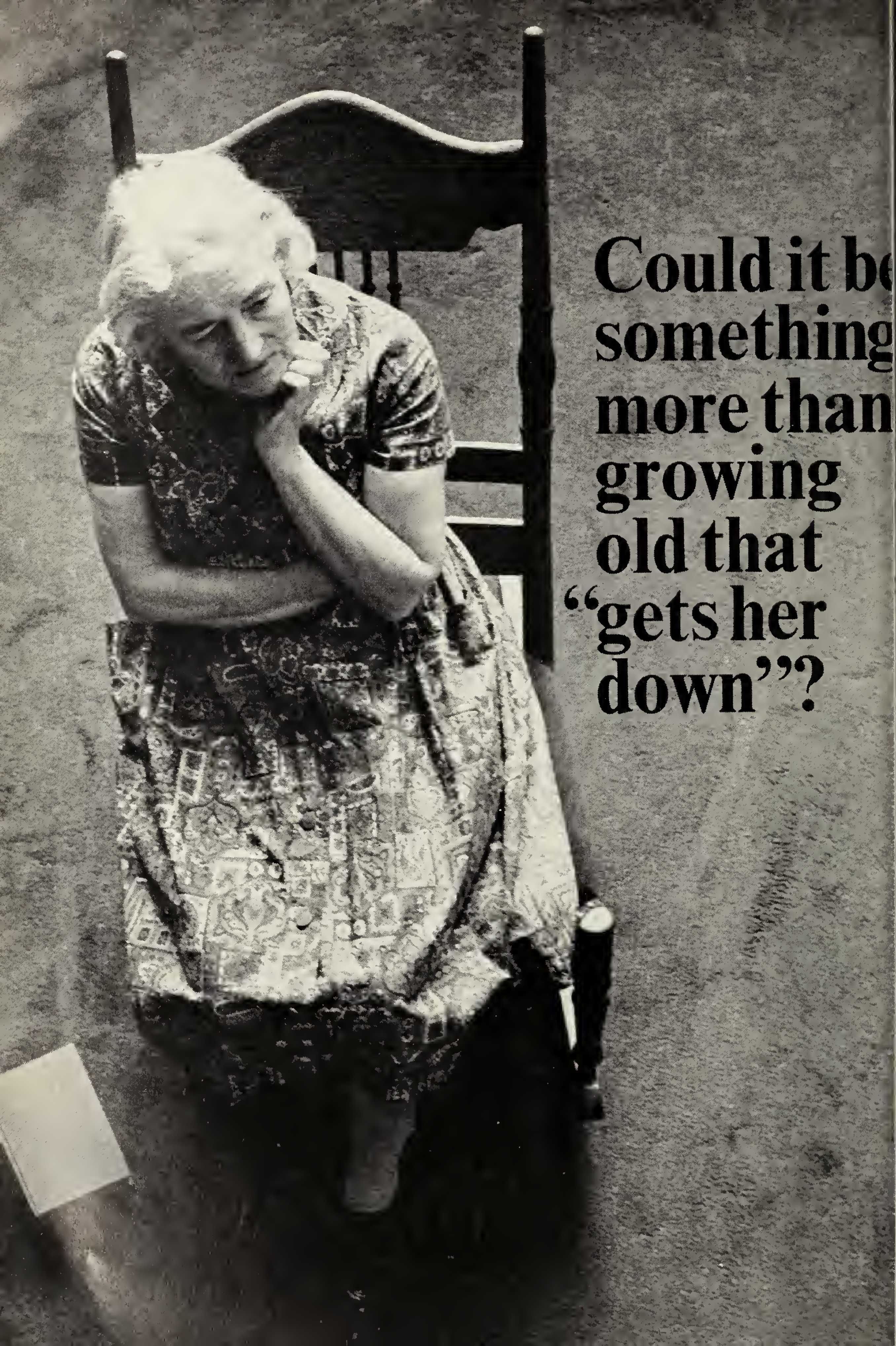
Doctor Bass, of Saginaw, stressed that MDPAC – Michigan Doctors Political Action Committee — is a voluntary organization of physicians, wives, and friends concerned about good government. The membership dues arrangement is set up so Michigan members also become members of AMPAC.

In commenting on the MDPAC efforts during the 1966 election, Doctor Bass stated, "We still have only begun to reach our potential."

MDPAC Board Member Frank B. Bicknell, M.D., Detroit.



Mrs. N. T. Pasternacki, Detroit, State Woman's Auxiliary Representative to the Board.


Could it b
something
more than
growing
old that
"gets her
down"?

Mild mood depression, poor appetite, little interest in the present or future. Does this picture mean that she's giving in to functional fatigue?

When functional fatigue is part of her problem, Alertonic can help counteract accompanying apathy and inertia. It helps lift mood, stimulate appetite, and establish new interest in daily life.

Pleasant-tasting Alertonic combines pipradrol hydrochloride—a gentle cerebral stimulant—with an excellent vitamin and mineral formula, in a satisfying 15% alcohol vehicle.

Especially in the aging patient, nothing fosters confidence and a sense of well-being better than your own personal warmth, understanding, and encouragement. Between visits, however, your prescription for Alertonic can help keep your patient from giving in to functional fatigue.

Adequate dosage is important: Prescribe Alertonic—one tablespoonful t.i.d., 30 minutes before meals ...tastes best chilled.

And for your patient's sake, prescribe Alertonic in the convenient, economical one-pint bottle.

Available only on prescription

Alertonic®

Each 45 cc. (3 tablespoonfuls) contains: alcohol, 15%, pipradrol hydrochloride, 2 mg.; thiamine hydrochloride (vitamin B_1) (10 MDR*), 10 mg.; riboflavin (vitamin B_2) (4 MDR), 5 mg.; pyridoxine hydrochloride (vitamin B_6), 1 mg.; niacinamide (5 MDR), 50 mg.; choline,† 100 mg.; inositol,† 100 mg.; calcium glycerophosphate, 100 mg. (supplies 2% MDR for calcium and for phosphorus) and 1 mg. each of the following: cobalt (as chloride), manganese (as sulfate), magnesium (as acetate), zinc (as acetate), and molybdenum (as ammonium molybdate).

*Multiple of adult Minimum Daily Requirement supplied.
†The need for these substances in human nutrition has not been established.

Indications: 1. Functional fatigue such as that often associated with: a depressing experience or stressful time of life; advancing years; convalescence; limited activity or confinement. 2. Poor appetite and vitamin-mineral deficiency as they occur in: patients having faulty eating habits; geriatric patients who are losing interest in food; patients convalescing from debilitating illness or surgery.

Contraindications: As with other drugs with CNS stimulating action, Alertonic is contraindicated in hyperactive, agitated or severely anxious patients and in chorea or obsessive compulsive states.

Side effects: Reports of overstimulation have been rare. Patients who are known to be unduly sensitive to the effects of stimulant drugs should be observed carefully in the initial stages of treatment.

Dosage: Adults, 1 tablespoonful; children (over 15 years old), 1 to 2 teaspoonfuls; children (4 to 15 years old), 1 teaspoonful. To be taken three times daily 30 minutes before meals.

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Mrs. Romney Charms Maternal Welfare Conference Banquet

WNEM-TV
Channel 5

Tom Crane, left, newsman for WNEM-TV in Flint, interviews Leon Israel, M.D., of Philadelphia, the banquet speaker at the Maternal and Perinatal Health Conference.

To doctors the recent MSMS Conference on Maternal and Perinatal Welfare in Flint was an opportunity to hear scientific lectures and see slides on practically every phase of mother and child care. One hundred and fifty doctors from all over Michigan attended.

To newsmen, the Conference was an opportunity to interview the experts about abortion and other topics.

And to everyone, the presence of Mrs. Romney at the banquet to receive a citation for family life leadership in Michigan was a delight. Her charm and sincerity were so compelling that you couldn't hear a glass clink, foot scrape, or throat cough.

"I've always had a lot to say," she opened, "but it wasn't until George became Governor that I've had the opportunity to say it."

"This is a very human citation," she continued, "and I am proud of it because as we all know the main cause of any human disturbance is in the break-up of family life."

"Our age is important because of its human and social values. If we do something to help strengthen family life we will go down in history as an important age," she said.

Speaking of her own experience in caring for an emotionally disturbed teen-age girl who came to live with their family, Mrs. Romney remarked, "She didn't feel she was worth anything, and when I took her shopping to get more suitable clothing for a girl of her age, she said, 'Nobody likes me the way I am.' I learned something from that. I was happy recently to receive a letter from her in which she was grateful for what we did for her. The shame is that so many people in her position don't get help early enough in life."

The Conference on Maternal Health, however, not only was the scene for solid scientific presentations and the eloquence of Mrs. Romney, but also showed the increasing willingness of physicians to speak out on the crucial issue of abortion.

No physician wants to be put into a hypocritical position. As J. Robert Willson, M.D., sensitively pointed out: "Obstetricians recognize the fact that some women with serious emotional disturbances cannot be effective mothers and should not be pregnant, but it is difficult for us to accept this alone as an indication for therapeutic abortion. We feel quite comfortable, however, if a psychiatrist assures us that the patient may commit suicide if she is not aborted. This makes termination 'legal' because pregnancy endangers the 'life' of the patient. The hospital committee approves the operation and we proceed, completely ignoring the fact that the suicide rate for pregnant women is much less than that for all women between the ages of 14 and 50. Pregnant women, even those who threaten to do so, do not often kill themselves.

"If we can conclude that there is little risk of suicide during pregnancy, even in women with

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Editor's Note: A photograph of Mrs. Romney receiving the Family Life Citation appeared in the April NEWS EXTRA.

emotional disorders, why do we terminate the pregnancy with this as the reason? We do so because of socio-economic factors, because we don't think that a child raised by psychotic parents stands a chance of developing normally or because so-called 'legal' abortion is much easier than caring for an emotionally disturbed patient during an entire pregnancy, labor, and puerperium. We accept psychiatric indications for abortion, but we deny that such procedures can be done legally."

Doctor Willson summarized the responsibilities of the physician: "Abortion is a medical problem, and the responsibilities of physicians, particularly obstetricians-gynecologists, are:

"(1) To acquaint legislators, clergymen, public officials, lay citizens, and their fellow physicians with the facts concerning present abortion practices.

"(2) To stimulate legislators to examine abortion laws and to prepare new ones which would conform to modern medical practices. Modern laws would permit responsible physicians to perform necessary abortions in reputable hospitals, legally and without the subterfuge which is now necessary.

"(3) To act as consultants to the legislators in their revision of the statutes.

"(4) To develop and support educational programs on sex education, contraception, and family living as important aspects of general health care. Hopefully, more complete and accurate understanding of reproduction in general will reduce the need for both therapeutic and illegal abortion."

Elizabeth Conway, reporter for the Flint Journal, interviews J. Robert Willson, M.D., Ann Arbor, one of the featured speakers at the Maternal and Perinatal Health Conference.

AME Fund Boosted By Detroit Party

Scholarships for needy African medical students will be supported by $3500 raised by the African Medical Education Fund at its pre-Thanksgiving Eve cabaret party last November, according to Robert Arrington, M.D., Detroit, Fund Treasurer.

Applications for scholarships may be addressed to Charles Whitten, M.D., Credentials Committee Chairman, African Medical Education Fund, Inc., 50 Westminster, Detroit 2.

DOCTORS TO ADDRESS INHALATION THERAPISTS

On the program May 24-25 for the Michigan Society of Inhalation Therapists Seminar, "A Progressive Study in Inhalation Therapy," are three Michigan physicians. They are: Paul Dumpke, M.D., Detroit, who will serve as moderator; Thomas DeKornfeld, M.D., Ann Arbor, speaking on "Schools of Inhalation Therapy;" and James Fryfogle, M.D., Southfield, whose topic will be "Post-Op. Respiratory Complications."

The Seminar is scheduled at the Pick Fort Shelby Hotel in Detroit.

KIDNEY FOUNDATION SYMPOSIUM, JUNE 3-4

The Michigan Kidney Foundation will hold its Sixth Annual Symposium, June 3-4, at the University of Michigan Medical Center.

Included on the program for the two-day Symposium are a number of well-known authorities from medical schools throughout the nation who will present talks and panel discussions.

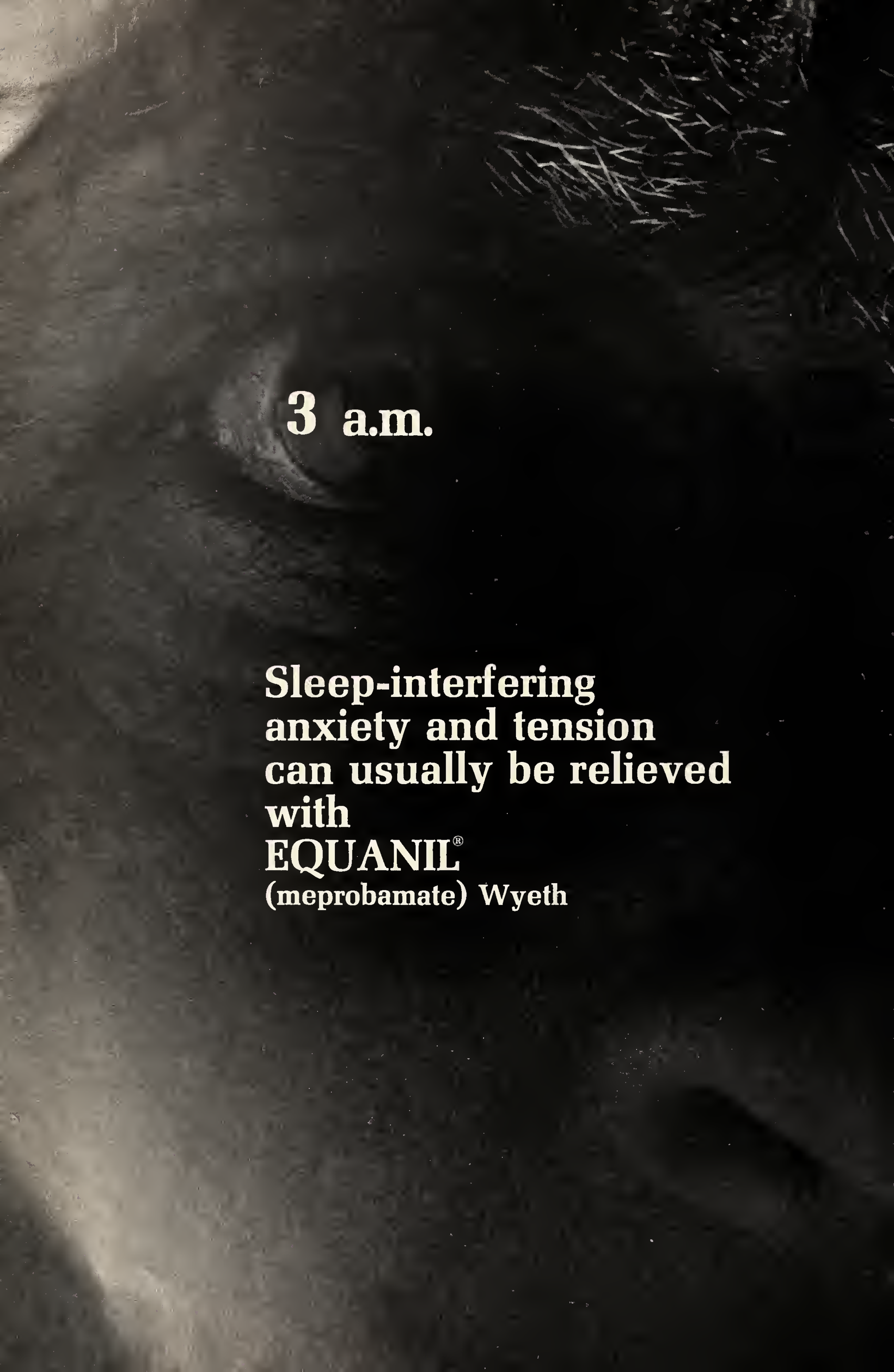
Inquiries may be addressed to James A. Greene, Jr., M.D., Department of Internal Medicine, University of Michigan Medical Center, Ann Arbor.

SKF OFFICIAL HEADS BOARD OF PMA

Walter A. Munns, Chairman of the Board of Smith Kline & French Laboratories in Philadelphia is the new chairman of the board of the Pharmaceutical Manufacturers Association, succeeding Lyman C. Duncan, Vice President for Medical Affairs of the American Cyanamid Company, Pearl River, New York.

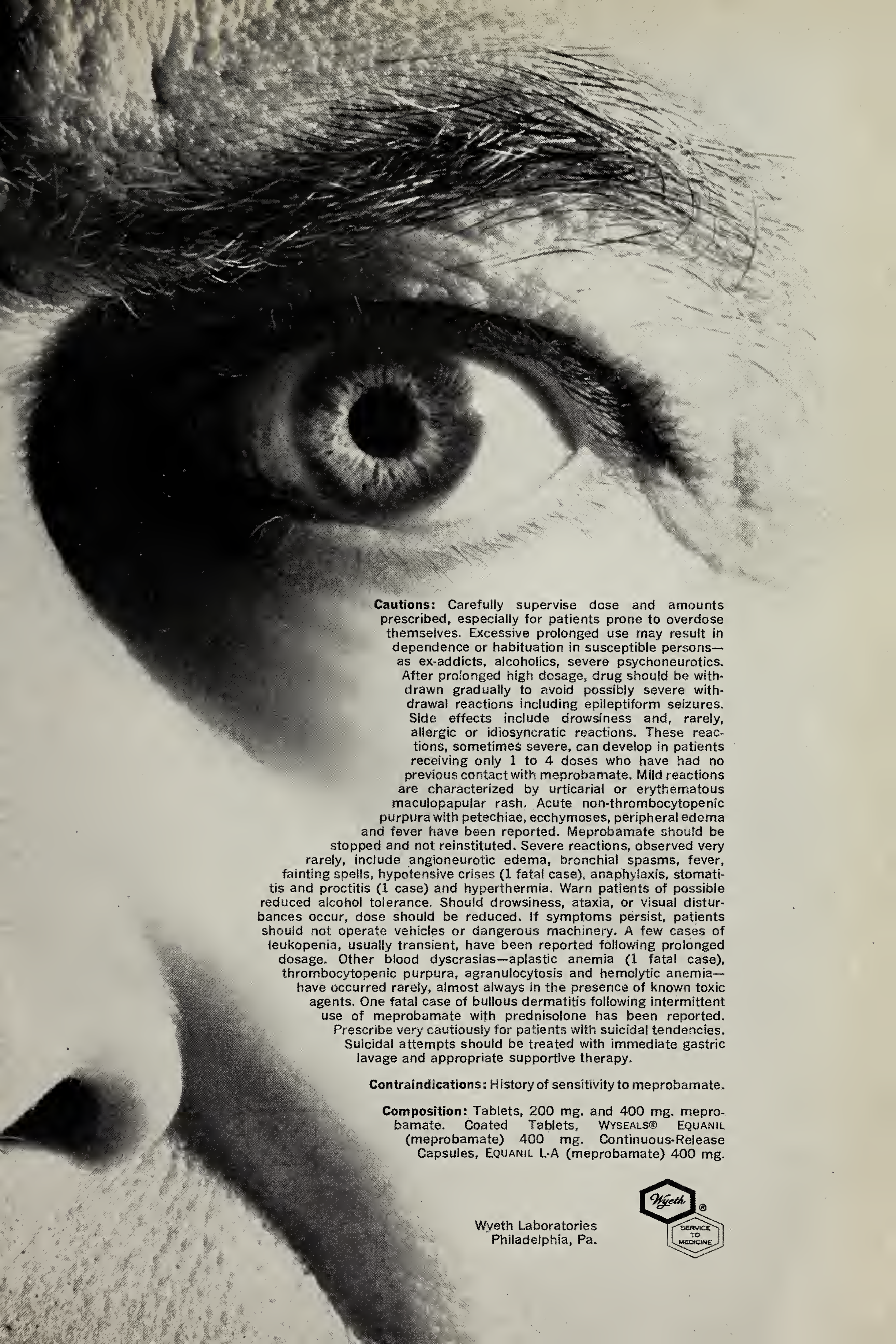
Mr. Munns was elected at the association's ninth annual meeting.

PMA is a non-profit scientific, professional, and trade organization representing 140 manufacturing firms which produce more than 90 percent of the nation's prescription drug products.



3 a.m.

Sleep-interfering anxiety and tension can usually be relieved with
EQUANIL®
(meprobamate) Wyeth



Cautions: Carefully supervise dose and amounts prescribed, especially for patients prone to overdose themselves. Excessive prolonged use may result in dependence or habituation in susceptible persons—as ex-addicts, alcoholics, severe psychoneurotics. After prolonged high dosage, drug should be withdrawn gradually to avoid possibly severe withdrawal reactions including epileptiform seizures. Side effects include drowsiness and, rarely, allergic or idiosyncratic reactions. These reactions, sometimes severe, can develop in patients receiving only 1 to 4 doses who have had no previous contact with meprobamate. Mild reactions are characterized by urticarial or erythematous maculopapular rash. Acute non-thrombocytopenic purpura with petechiae, ecchymoses, peripheral edema and fever have been reported. Meprobamate should be stopped and not reinstituted. Severe reactions, observed very rarely, include angioneurotic edema, bronchial spasms, fever, fainting spells, hypotensive crises (1 fatal case), anaphylaxis, stomatitis and proctitis (1 case) and hyperthermia. Warn patients of possible reduced alcohol tolerance. Should drowsiness, ataxia, or visual disturbances occur, dose should be reduced. If symptoms persist, patients should not operate vehicles or dangerous machinery. A few cases of leukopenia, usually transient, have been reported following prolonged dosage. Other blood dyscrasias—aplastic anemia (1 fatal case), thrombocytopenic purpura, agranulocytosis and hemolytic anemia—have occurred rarely, almost always in the presence of known toxic agents. One fatal case of bullous dermatitis following intermittent use of meprobamate with prednisolone has been reported. Prescribe very cautiously for patients with suicidal tendencies. Suicidal attempts should be treated with immediate gastric lavage and appropriate supportive therapy.

Contraindications: History of sensitivity to meprobamate.

Composition: Tablets, 200 mg. and 400 mg. meprobamate. Coated Tablets, WYSEALS® EQUANIL (meprobamate) 400 mg. Continuous-Release Capsules, EQUANIL L-A (meprobamate) 400 mg.

Wyeth Laboratories
Philadelphia, Pa.

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SERVICE TO MEDICINE

BEEMAN

KOZONIS

Beeman Installed; Kozonis Chosen Next President of MHA

A cardiologist, appropriately, has been named president-elect of the Michigan Heart Association. He is Michael C. Kozonis, M.D., Pontiac. Doctor Kozonis will serve a one-year term as president in 1968.

Installed as president of the Association was Carl B. Beeman, M.D., Grand Rapids. Doctor Beeman is a past president of the Kent County Medical Society and the Michigan Society of Internal Medicine, and he has practiced internal medicine in Grand Rapids since 1938.

ADD MEDICAL FACILITY TO UNIVERSITY HOSPITAL

The University of Michigan has purchased the new 103-bed Parkview medical facility in Ann Arbor at a cost of $1,100,000.

Initially, 50 beds will be assigned to extended acute care and the remaining 53 to extended care. This could effect an economy for University Hospital patients who otherwise would be cared for in the general hospital.

U-M physicians will make regular rounds at Parkview and will be constantly on call. Present plans do not envision having doctors permanently located in the unit.

SIX MEN ADVANCED BY MICHIGAN MEDICAL

Six Blue Shield vice presidents have been named. Those promoted were:

Albert Kaufman, Vice President, Public and Staff Affairs; Jay Mossman, Vice President, Finance; Marvin Novick, Vice President, Data and Actuarial Services; Donald Puscas, Vice President, Planning and Marketing; William Stevenson, Vice President, Claims Administration; and John Verbiest, Vice President, Professional Relations.

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- EMPHYSEMA
- ASTHMA
- CHRONIC BRONCHITIS
- BRONCHIECTASIS

The fast-disintegrating uncoated tablet gives relief in 15 minutes

Each tablet contains:

Potassium Iodide	195 mg.
Aminophylline	130 mg.
Phenobarbital, Caution: May be habit forming	21 mg.
Ephedrine HCl	16 mg.

FEDERAL LAW PROHIBITS
DISPENSING WITHOUT PRESCRIPTION

Precautions: Usual for aminophylline-ephedrine-phenobarbital. Iodides may cause nausea, long use may cause goiter. Discontinue if symptoms of iodism develop.

Iodide contraindications: tuberculosis, pregnancy.

DOSAGE

One tablet, with full glass of water, 3 or 4 times daily.

Dispensed in bottles of 100 and 1000 tablets.

MUDRANE GG—Formula, dosage and package identical to Mudrane—*except*—100 mg. glyceryl guaiacolate replaces the potassium iodide. The value of Mudrane cannot be enjoyed by a small group in which K.I. is contraindicated. Mudrane GG is prepared for this group.

MUDRANE GG ELIXIR—Four 5 cc teaspoonfuls is equivalent to one Mudrane GG tablet. Dosage adjusted to age and weight of child. Mudrane GG Elixir is for pediatric patients and those who think they cannot swallow tablets. Dispensed in pint and half gallon bottles.

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RICHMOND, VIRGINIA 23217
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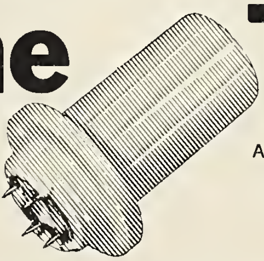
what time is it?

For the past
two years
there's been
one new case
of active tuberculosis
reported for every
four thousand
of U.S. population.

it's time to tine.

Tuberculin, Tine Test

(Rosenthal) Lederle



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Can Chronic Alcoholic Be Sent To Prison? Supreme Court Ruling Awaited

The Michigan Supreme Court is expected to rule in May on an appeal contending that a chronic alcoholic is a sick man, not a willful criminal.

The question stems from an appeal of the October 23, 1964, conviction of a Lansing man, Frederick Hoy, for beink drunk in a public place. It was Hoy's second offense.

He originally pleaded guilty, then asked to withdraw the plea. His request was denied, and Hoy served a minimum sentence and was paroled.

Hoy's court-appointed attorney, W. Charles Kingsley, appealed the case on the grounds that chronic alcoholism is an illness or disease requiring treatment.

"IF IT IS a disease or illness," Kingsley said, "then this is a cruel and inhuman punishment." He said it is a violation of the Eighth Amendment to the Constitution.

Attorney Kingsley also offered a point involving "voluntariness," which has been accepted by certain appeal courts.

"Commission of crime involves a voluntary act," he said.

"In common law," Kingsley added, "a person must be able to determine right from wrong. If a man doesn't have control of his capabilities, then one of the essential ingredients in commission of a crime is not there."

Kingsley contended that the chronic alcoholic lacks this capacity and is drawn to drink.

Pointing out that the result of the case could have national implications, he said that "it is a public and medical problem, and that is exactly what the chronic alcoholic is."

ALTHOUGH HE admitted that it is a backdoor approach, Kingsley said the case will "focus attention on the whole subject."

He added, "It is unusual for courts to force legislatures to do something. But after all, there comes a time when you can't just leave all those fellows (chronic alcoholics) on the streets, and facilities will have to be provided for them."

Kingsley noted that in Washington, D.C., a program is underway where 3,300 to 3,400 "cardholders" are certified as chronic alcoholics by medical and legal authorities.

He noted that Congress many years ago provided programs to care for these people, but no money was appropriated to accompany the action.

Completes Study About Who Reads What Articles About Health

Better-educated persons, women, and white people are most apt to read about health, according to studies reported by a University of Michigan researcher.

James W. Swinehart also found that more frequent reading about health was reported by people who feel their own health is good or excellent.

Mr. Swinehart found that when offered a choice between a "high-threat" article or a "low-threat" topic, almost everyone chose the former. He contended that seeking information may be a substitute for action.

His studies, Mr. Swinehart said, showed that the element of fear in health communications helps attract an audience, but the same fear may also influence it to forget a health message sooner.

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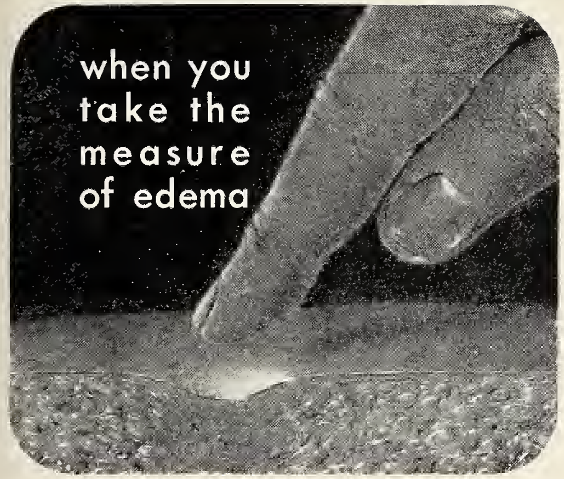

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(BENZTHIAZIDE)

AQUATAG (Benzthiazide) is a potent, orally active, nonmercurial, diuretic agent. It is effective orally in producing diuresis in edema states, where it is therapeutically comparable to mercurials given parenterally. AQUATAG (Benzthiazide) is mildly antihypertensive in its own right and enhances the action of other antihypertensive drugs when used in combination.

DIURETIC ACTION: Clinically, the oral administration of AQUATAG (benzthiazide) results in diuretic activity within two hours with maximal natriuretic, chloruretic, and diuretic effects occurring during the fourth, fifth and sixth hours. Maintenance of response continues for approximately 12 to 18 hours. Acidosis is an unlikely complication since therapeutic doses of AQUATAG (benzthiazide) do not appreciably increase bicarbonate excretion. Edematous patients receiving 50 mg. of AQUATAG (benzthiazide) daily for five days developed a maximal increase in the rate of sodium excretion on the first day, and maintained this high rate until depletion of excessive body stores of sodium.

In congestive heart-failure patients, AQUATAG (benzthiazide) produced the same weight loss, during a 48-hour treatment period as did a maximally effective dose of hydrochlorothiazide.

DOSAGE: Diuresis, initially 50 to 200 mg.; maintenance 25 to 150 mg., daily. Hypertension 50 to 100 mg. initially, adjusted to 50 mg. t.i.d. or downward to minimal effective dosage level.

WARNINGS: Use with caution in the presence of renal disease as azotemia may be precipitated or increased. In patients with advanced hepatic disease, electrolyte imbalance may result in hepatic coma. Dosage of coadministered antihypertensive agents should be reduced by at least 50%. In cases of suspected electrolyte imbalance, serum electrolyte determinations,should be performed and imbalance, if any, corrected. Stenosis or ulcer of small intestine have been reported with coated potassium formulas, and surgery has been required and deaths have occurred. Based on surveys of both United States and foreign physicians, incidence of these lesions is low and a causal relationship in man has not been definitely established. Until further experience has been obtained, the use of the drug in pregnant patients should be weighed against possible hazards to the fetus.

CONTRAINDICATIONS: AQUATAG (benzthiazide) is contraindicated in progressive renal disease or dysfunction including increasing oliguria and azotemia. Continued administration of this drug is contraindicated in patients who show no response to its diuretic or antihypertensive properties. Severe hepatic disease is a relative contraindication. (See "Warnings" above.)

PRECAUTIONS AND SIDE EFFECTS: Electrolyte imbalance with hypokalemia (digitalis toxicity may be precipitated), hypochloremic alkalosis and hyponatremia may occur.

Patients with cirrhosis should be observed for impending hepatic coma and hypokalemia. Other reactions may include blood dyscrasias, hyperuricemia and gout, nausea, jaundice, anorexia, vomiting, diarrhea, dizziness, paresthesia, photosensitivity and headache. Hepatic fetor, tremor, confusion and drowsiness are signs of impending pre coma and coma in patients with cirrhosis. Insulin requirements may be altered in diabetes. AQUATAG (benzthiazide) should be used with caution post-operatively as hypokalemia is not uncommon. Potassium supplementation may be advisable pre- and post-operatively. There have been occasional reports of thrombocytopenia, leukopenia, agranulocytosis, aplastic anemia and precipitation of acute pancreatitis or jaundice.

Before prescribing or administering, read the package insert or file card available on request.

Available as 25 or 50 mg. scored tablets.

Request clinical samples and literature on your letterhead.

S.J.TUTAG
& COMPANY
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Wanted: Names of Leaders Of Medical Organizations

Michigan Medicine would like to obtain and print a full list of the medical specialty organizations in Michigan with the names and addresses of their current offices.

Some of this information is on file, but the list is incomplete.

This is an appeal that the offices of the specialty groups in Michigan please provide such information today.

Please write to Managing Editor, *Michigan Medicine,* 120 West Saginaw Street, East Lansing, Michigan 48823.

Offer Seminar on Eye Tumors

The May 13 seminar of the Michigan Society of Pathologists, at Sparrow Hospital, in Lansing will discuss "Tumors of the Eye."

The speaker will be Lorenz Zimmerman, M.D., noted authority on ophthalmic pathology, on the staff of the Armed Forces Institute of Pathology, Walter Reed Army Medical Center, Washington, D.C.

County Procedures Standardized

A recent Director's Conference of the Michigan Department of Public Health has resulted in standards of performance and related recommendations for the guidance of local boards of health, health officers, and public health staff members in administering public health services associated with maternal and child health, community sanitation, communicable disease control, chronic disease control, and records.

PROUD MOMENTS . . .

"The establishment of the State Board of Health would have been postponed to a much later date had it not been for the efforts of this Society. Individually and through committees, the members labored from 1870 to 1873 until the bill for the establishment of the Board passed the Legislature."

That quotation about a highlight in MSMS history is taken from *A Century of Service in Medicine — A History of the Michigan State Medical Society* by Wm. J. Stapleton, Jr., M.D., Detroit, the MSMS Historian.

Copies of the handsome book may be obtained from the Michigan State Medical Society, 120 West Saginaw, East Lansing, Michigan 48823, for $2.00 each.

Sustained circulatory, respirator
and cerebral stimulation for th

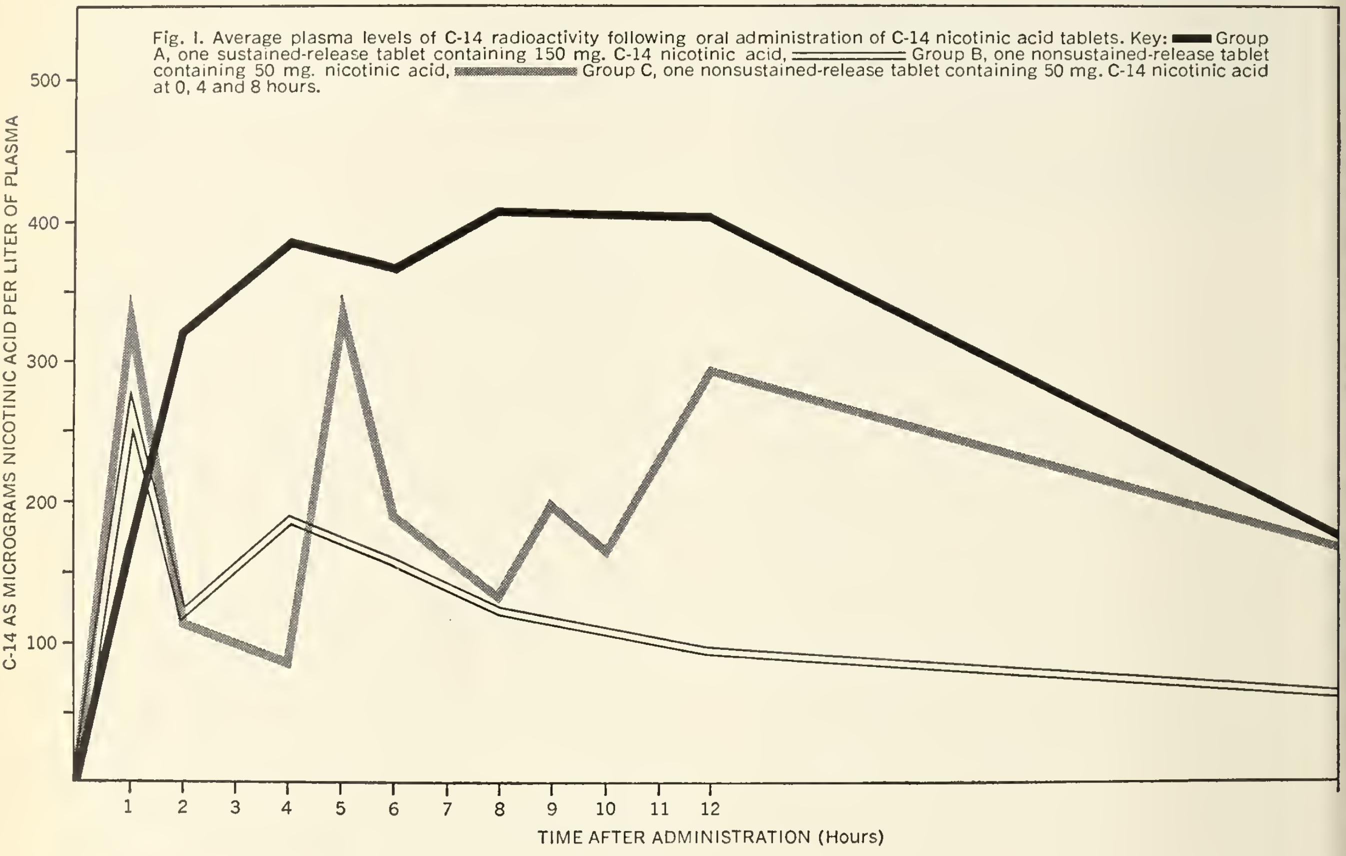
Fig. I. Average plasma levels of C-14 radioactivity following oral administration of C-14 nicotinic acid tablets. Key: ▬ Group A, one sustained-release tablet containing 150 mg. C-14 nicotinic acid, ═ Group B, one nonsustained-release tablet containing 50 mg. nicotinic acid, ▨ Group C, one nonsustained-release tablet containing 50 mg. C-14 nicotinic acid at 0, 4 and 8 hours.

(fewer absent doses by absent-minded patients)

Human volunteer subjects were administered Geroniazol TT tablets with the nicotinic acid component made radioactive with C-14. Plasma and urine samples were analyzed. (See Figures I and II) The radioactive tracer study substantiated the previous clinical evidence that the release of nicotinic acid from the Geroniazol TT tablet produced a gradual rise in plasma levels to a plateau for a total of 12 hours and more.

Such proven sustained activity makes the management of geriatric patients much easier by minimizing the possibility of neglected doses through absent-mindedness or senile confusion. Therapy *can* be continuous on a daily dose of only one Geroniazol TT tablet every 12 hours.

The gradual release of nicotinic acid in Geroniazol TT will provide the well-known peripheral vasodilatation needed in patients with deficient circulation and with a minimum amount (if any) of "flushing." Also, cerebrovascular circulation is complemented by pentylenetetrazol, long-established as a cerebral and respiratory stimulant.

Geroniazol TT improves the typical, unfortunate, signs of senile confusion. Patients become more alert,

ged and debilitated

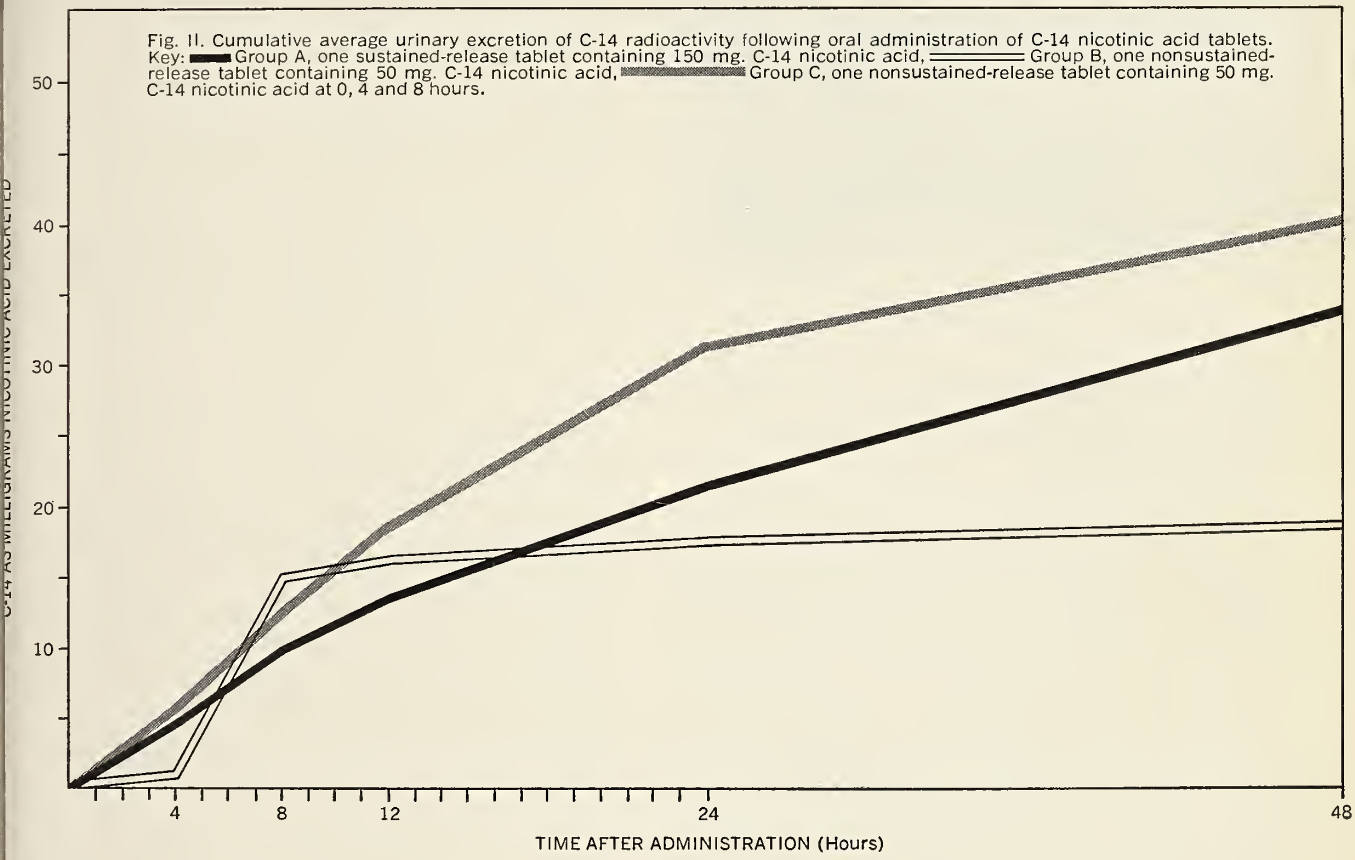

Fig. II. Cumulative average urinary excretion of C-14 radioactivity following oral administration of C-14 nicotinic acid tablets. Key: ▬ Group A, one sustained-release tablet containing 150 mg. C-14 nicotinic acid, ═ Group B, one nonsustained-release tablet containing 50 mg. C-14 nicotinic acid, ▨ Group C, one nonsustained-release tablet containing 50 mg. C-14 nicotinic acid at 0, 4 and 8 hours.

ess confused and moody. Personal care, memory, emotional stability, social attention improve. Fatigue, apathy and irritability are reduced.

A prescription for 100 tablets of Geroniazol TT will permit your patients to enjoy the benefits of time-prolonged nicotinic acid/pentylenetetrazol therapy, at an economical price. Dosage is only one tablet every 12 hours.

Contraindications: There are no known contraindications.

Precautions: Exercise caution when treating patients with a low convulsive threshold.

Side Effects: Side effects are rarely encountered, however due to the vasodilatation effect of nicotinic acid, transitory mild nausea, flushing, tingling and pruritus are possible.

Dosage: One tablet every 12 hours.

Supplied: Prescribe bottles of 100 tablets, to take advantage of recent price reduction.

References: 1. Report by Nuclear Science & Engineering Corp., Pittsburgh, Pa., in files of Philips Roxane Laboratories. 2. Connolly, R.: W. Virginia Med. J. *56*:263 (Aug.) 1960. 3. Curran, T. R., and Phelps, D. K.: Am. Pract. & Digest Treat. *11*:617 (July) 1960.

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PHILIPS ROXANE LABORATORIES
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A Subsidiary of Philips Electronics and
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Geroniazol® TT

nicotinic acid 150 mg., pentylenetetrazol 300 mg.
Tempotrol® Time Controlled Tablet

Many from Michigan Going to AMA Event At Atlantic City

Many physicians from Michigan will join their colleagues from across the nation to keep this convention center busy during the 1967 Annual American Medical Association Convention, June 18-22, in Atlantic City, New Jersey.

In addition to a full schedule of meetings, there will be plenty for physicians and their families to see and do in Atlantic City, which annually plays host to some 16 million visitors. One of America's original resort cities, it has long been famous for its Boardwalk, salt water taffy, beauty contests, ocean piers, and seaside hotels and motels.

To the tourist, Atlantic City offers an expansive beachfront, five golf courses, boating and fishing, plus some 400 restaurants. And to get visitors from place to place, there are unique forms of transportation, such as the Boardwalk's roller chairs and miniature jitney buses, which travel the full length of Atlantic City.

Michigan AMWA Unit Plans Detroit Dinner

The Michigan Chapter of the American Medical Writers Association will hold a spring meeting at University Club, 1411 East Jefferson Avenue, Detroit, on May 24.

C. Howard Ross, M.D., President, reports that guests (including husbands and wives) are invited to gather at 6:15 P.M. for refreshments, dinner, and ten-minute talks.

Subjects will include "An Intern Speaks," "A Veteran Writer Speaks," "Audio-Visual Aids in Medical Education," as well as other suggestions for improvements in writing, editing, and dissemination of medical information.

FORD FOUNDATION HELPS RESEARCH IN MICHIGAN

A recent Ford Foundation publication describes research work over the past year by two Michigan universities.

The University of Michigan was awarded grants for population studies under the Foundation's Population Program. Included in the grant were funds for centers for training and research in population and family planning, in demography, and in medical-student research in reproductive biology.

Also received at the U-M was a research grant for work to attain a new level of quality in international studies and for analytic studies of consumer behavior. This grant was made under the Foundation's program of Economic Development and Administration.

The Foundation awarded Michigan State University a grant for adapting operational gaming to urban-planning research. The grant was under the Foundation's area of urban and regional affairs.

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MERCYWOOD HOSPITAL

4038 Jackson Road — *Conducted by Sisters of Mercy* — Ann Arbor, Michigan

Telephone — 313 663-8571

Mercywood Hospital is a private neuro-psychiatric hospital licensed by the Michigan Department of Mental Health. Mercywood specializes in intensive, multidisciplinary treatment for emotional and mental disorders.

Accredited by the Joint Commission on Accreditation of Hospitals and the National League of Nursing. A full Blue Cross participating hospital.

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Stuart M. Gauld, Jr., M.D.
Leonard E. Himler, M.D.
Stephen C. Mason, M.D.
Richard D. Watkins, M.D.
Rudolf E. Nobel, M.D.
Sydney Joseph, M.D.
James R. Driver, M.D.

Attention of the members is directed to some directory-type information on Pages 590-596.

MUCH MATERIAL AVAILABLE ON NARCOTICS, DRUGS:

MSMS has received requests from its members for help in talking to youth and parent groups about narcotics and drugs.

The AMA has some excellent publications, and the National PTA offers the following list of reference materials to help develop speeches, programs, radio or TV scripts, etc.:

BOOKS:

Cohen, Sidney. *The Beyond Within: The LSD Story.* Atheneum Press, 1964.

Duvall, Evelyn Millis; Roswell J. Gallagher, M.D.; and Hubert I. Harris, M.D. *Emotional Problems of Adolescence.* Oxford University Press, 1958.

Ginzberg, Eli, editor. *Values and Ideals of American Youth.* Columbia University Press, 1961.

Havighurst, Robert J. *Human Development and Education.* Longmans Green, 1953.

Johns Hopkins University. *Conference on Drugs in Our Society.* Johns Hopkins Press, 1964.

Joint Committee of the American Bar Association and the American Medical Association. *Narcotic Drugs and Drug Addiction—Crime or Disease?* Indiana University Press, 1961.

Seidman, Jerome M., editor. *The Adolescent—A Book of Readings.* Revised edition. Holt, 1960.

NATIONAL PTA PUBLICATIONS:

Children's Emotional Health—A PTA Guide for Community Services. 75 cents.

Thinking Straight About Drinking. 35 cents.

What PTA Members Should Know About Juvenile Delinquency:A Guide for Action. 75 cents.

ARTICLES IN *THE PTA MAGAZINE:*

Anderson, Wayne J., and Henry Long. "Ideals Can Be Disquieting." May 1965, pages 14-16.

Gallagher, J. Roswell, M.D. "The Emotional Life of the Teenager." February 1964, pages 26-28.

Squires, Raymond. "The Morals of a Teen." April 1965, pages 4-6.

SOCIO-GUIDRAMAS:

No. 10, *Who's Delinquent?* No. 12, *Granny, This Isn't 1890;* No. 13, *Trust—Absent;* No. 16, *Bottle of Trouble.* Methods and Materials Press, 6 South Derby Road, Springfield, New Jersey 07081.

FILMS:

Emotional Maturity (20 minutes), McGraw-Hill.

Mental Health (12 minutes), Encyclopaedia Britannica Films.

What About Drinking? (11 minutes), McGraw-Hill.

Delegates Urged to Set Example — Join MDPAC

A special appeal has been sent to all seated delegates at the 1966 MSMS House of Delegates annual meeting by J. J. Lightbody, M.D., Speaker of the House, urging each to be a member of MDPAC.

The letter, in part, said, "you will recall that the 1966 House of Delegates adopted Resolution No. 70 commending the officers and Board of Directors of MDPAC, and resolved that the delegates (should) set an example by contributing on an individual basis to this organization. MDPAC, although it is an infant organization, unquestionably made a significant impact on the course of the general elections in 1966. As a result more friends of our profession occupy seats in both the Congress and the State Legislature."

Doctor Lightbody points out that "1967 is not an election year and it is understandable that interest in MDPAC activity slackens appreciably in the absence of the excitement of a political campaign. Nonetheless, 1968 will soon be upon us, and 1968 is both a state and national election year. Eighteen months is all too short a time to develop a muscle we will need to overcome the challenges ahead."

332 MORE ENROLLED IN BLUES GROUP

Michigan Blue Cross-Blue Shield received 332 applications in the March 1 - March 15, 1967, enrollment campaign for the Michigan State Medical Society group. This includes 56 new and 61 group transfer applications from MSMS members as well as 139 new and 76 transfer applications from medical assistants.

Under this Blue Cross-Blue Shield plan Michigan State Medical Society members and their medical assistants become eligible for coverage at group rates.

MANY DOCTORS SERVE EPILEPSY CENTER BOARD

Seven physicians are serving on the Board of Directors of the Michigan Epilepsy Center and Association. They are: Willard W. Dickerson, M.D., Caro; Benjamin Jeffries, M.D., Harper Woods; Jasper E. McLaurin, M.D., Detroit; G. Fred Moench, M.D., Midland; A. S. Narotsky, M.D., Ishpeming; Frank S. Perkin, M.D., Detroit; and Joseph L. Wheland, M.D., Detroit.

Doctor Jeffries is president of the MEC-A.

KIDNEY SYMPOSIUM AT U-M

The Sixth Annual Michigan Kidney Foundation Symposium will be held at the University of Michigan Medical Center, June 3 and 4, 1967. Topics covered will be glomerular nephritis, urinary tract infection, dialysis, and transplantation.

A detailed program of the Symposium and an application to enroll may be obtained from Harry A. Towsley, M.D., Department of Postgraduate Medicine, University Hospital, Ann Arbor, Michigan 48104.

Urge Retired Doctors Return, Practice Again

As the medical needs of America grow, it is important to encourage young men to become physicians.

Another way of meeting the need for physicians is to start at the opposite end, to encourage retired physicians to return to part time practice. In the United States there are approximately 2,600 non-practicing women physicians and 8,500 retired physicians.

The retired physician who returns to limited work brings an immediate benefit to the community — the art of healing which has developed through many years of active service. He may not be able to work at the pace of a young man, but whatever he does will be of service to meet the ever-increasing medical needs of this country.

The American Medical Association is presently considering the establishment of a special branch of the Physician's Placement Service which would keep a list both of the full time and part time employment opportunities and a list of retired physicians who are interested in returning to employment.

Michigan retired physicians who would like to consider returning to part time employment should fill out the form below and send it to:

Retired Physician Inquiry
Michigan State Medical Society
P.O. Box 152
E. Lansing, Michigan 48823

I am at present retired:

Name ....

Address ....

City ....

I would appreciate receiving further information on parttime working possibilities.

Tandearil®
oxyphenbutazone

Tandearil in Painful Shoulder

Therapeutic Effects: Stiffness and pain may diminish within 2 days, and full mobility may be restored within a week. These effects are obtained with oxyphenbutazone alone or combined with physiotherapy or local hormonal injections. The drug is usually well tolerated and does not affect pituitary-adrenal function or immune response.

Contraindications: Edema; danger of cardiac decompensation; history or symptoms of peptic ulcer; renal, hepatic or cardiac damage; history of drug allergy; history of blood dyscrasia. The drug should not be given when the patient is senile or when other potent drugs are given concurrently.

Warning: If coumarin-type anticoagulants are given simultaneously, watch for excessive increase in prothrombin time. Pyrazole compounds may potentiate the pharmacologic action of sulfonylurea, sulfonamide-type agents and insulin. Carefully observe patients receiving such therapy. Use with great caution in the first trimester of pregnancy.

Precautions: Obtain a detailed history and a complete physical and laboratory examination, including a blood count. The patient should be closely supervised and should be warned to report immediately fever, sore throat, or mouth lesions (symptoms of blood dyscrasia); sudden weight gain (water retention); skin reactions; black or tarry stools or other evidence of intestinal hemorrhage. Make regular blood counts. Discontinue the drug and institute countermeasures if the white count changes significantly, granulocytes decrease, or immature forms appear. Use greater care in the elderly and in hypertensives.

Adverse Reactions: The most common are nausea, edema and drug rash. The drug has been associated with peptic ulcer and may reactivate a latent peptic ulcer. Infrequently, agranulocytosis, or a generalized allergic reaction may occur and require withdrawal of medication. Stomatitis, salivary gland enlargement, vomiting, vertigo and languor may occur. Leukemia and leukemoid reactions have been reported but cannot definitely be attributed to the drug. Thrombocytopenic purpura and aplastic anemia may occur. Confusional states, agitation, headache, blurred vision, optic neuritis and transient hearing loss have been reported, as have hyperglycemia, hepatitis, jaundice, and several cases of anuria and hematuria. With long-term use, reversible thyroid hyperplasia may occur infrequently. Moderate lowering of the red cell count due to hemodilution may occur.

Dosage in Painful Shoulder: 600 mg. daily in divided doses for 2 to 3 days; 300 mg. daily thereafter. Usual duration of therapy: 2 to 7 days.

Availability: Tablets of 100 mg. 6562-VI(B)R

For complete details, please refer to full prescribing information.

Geigy

Geigy Pharmaceuticals
Division of Geigy Chemical Corporation
Ardsley, New York

Geigy

Tandearil®
oxyphenbutazone

helps painful shoulders move again

Please see adjoining page for brief prescribing summary.

TA-5094PC

	3 out of 4 painful shoulder patients responded well
Sperling, I.L.: Applied Therap. 6:117, 1964.	84.2% of 127 patients
Rosenbaum, E.E., and Schwarz, G.R. Northwest Med. 61:927, 1962.	81% of 48 patients

Why these 7 patients with moderate to severe anxiety may respond better to Mellaril

1. The agitated patient.

Anxiety—particularly that beyond the range of minor tranquilizers—frequently is expressed as gross motor restlessness, fidgetiness and purposeless movements, and may erupt into aggressive behavior. Mellaril is almost a specific for those patients whose anxiety follows such a pattern.

The psychosomatic patient.

he family physician is rarely given e diagnostic luxury of a classic, xtbook "anxiety state." Most often must probe for anxiety masked by functional disorder—or which exacbates a somatic problem. Doubleind evaluations have demonstrated at Mellaril can be a significant adnct in the treatment of such patients.

The patient under tuational stress.

llaril helps the patient deal with esses of everyday life. Nonhabitung, it can be given for extended peds of time. It does not "separate" patient from practical problems d pressures, does not induce eupho- or a fuzziness which can compronise the ability to cope with realities. Rather, it helps the patient move more competently in his daily world by eliminating useless tension, by allowing him to conserve emotional resources and energies, and to direct them against the problems really worth worrying about.

4. The menopausal patient.

The woman who sees change of life as the end of useful life requires support from both family and family physician. Whether the psychological impact of menopause is directly related to hormonal changes, or merely coincidental, is debatable, but estrogenic therapy is frequently inadequate. Mellaril is a useful aid for these patients and, alone, or in combination with reduced estrogen dosage, will help ease the menopausal misery.

5. The previously hospitalized psychiatric patient.

Such a patient may still require the type of medication he has been accustomed to, but because he is no longer in a controlled setting the acceptable level of adverse reactions must be lower. In such circumstances Mellaril is perhaps the drug of choice.

6. The agitated geriatric.

Tranquilizer therapy in the elderly patient always involves special (or at least accentuated) problems: the possibility of drug-induced ataxia, hypotension or depression, for example, assumes an additional significance. These reactions have rarely been observed in geriatric patients treated with Mellaril.

7. The constantly returning patient.

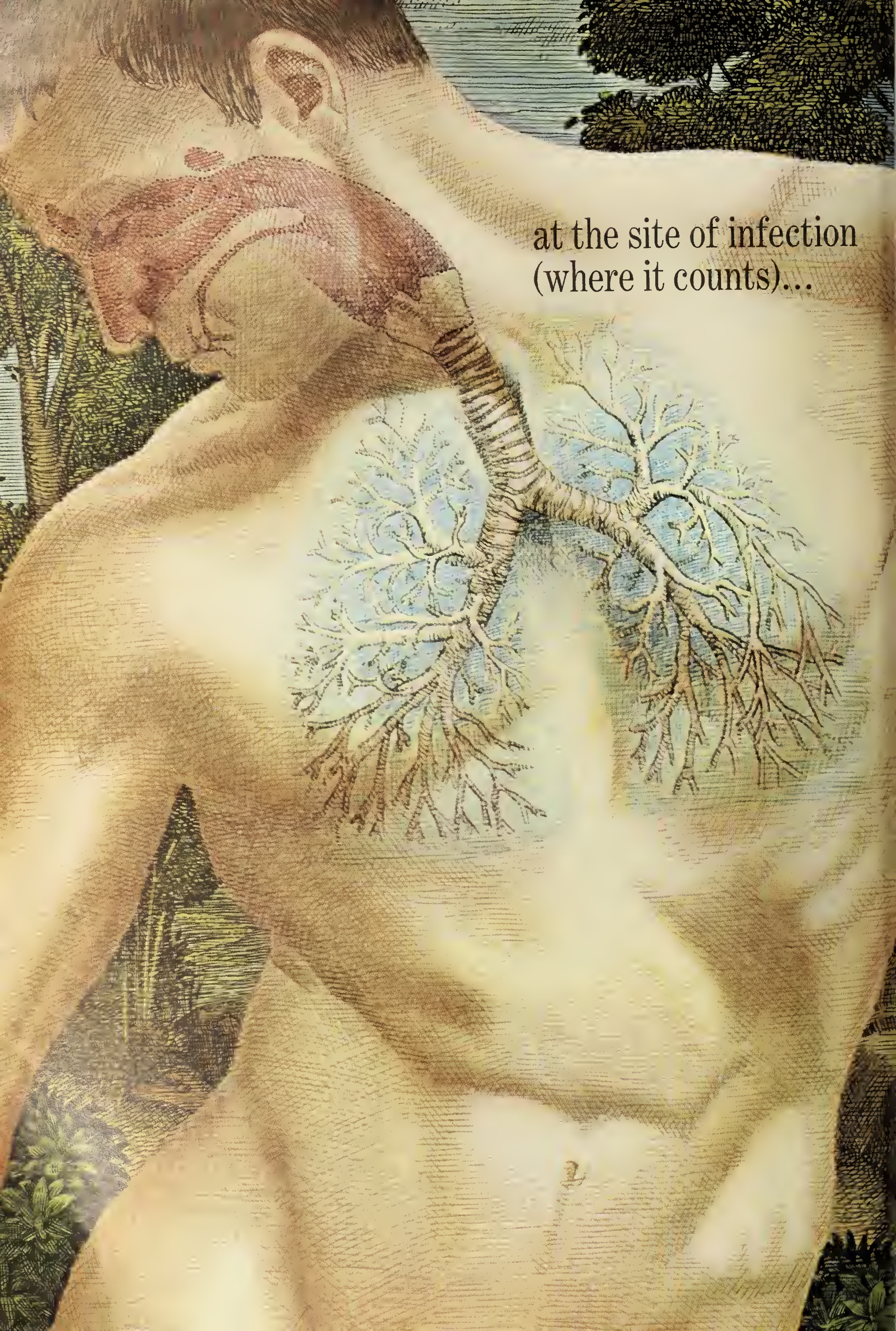
The anxiety patient who has not responded to a minor tranquilizer is not very likely to benefit from your minor tranquilizer of second choice. A major tranquilizer, such as Mellaril, may be indicated in such patients.

Contraindications: Severely depressed or comatose states from any cause, and in association with or following MAO inhibitors; severe hypertensive or hypotensive heart disease.
Precautions: Hypersensitivity reactions (e.g., leukopenia, agranulocytosis) and convulsive seizures are infrequent. Pigmentary retinopathy has been observed where doses in excess of those recommended were used for long periods of time. May potentiate central nervous system depressants, atropine, and phosphorus insecticides. Where complete mental alertness is required, administer the drug cautiously and increase dosage gradually. In addition, orthostatic hypotension (especially in female patients) has been observed. Epinephrine should be avoided in treatment of drug-induced hypotension.
Side Effects: Pseudoparkinsonism and other extrapyramidal disorders are infrequent; drowsiness, especially in high doses early in treatment, may occur; nocturnal confusion, dryness of the mouth, nasal stuffiness, headache, peripheral edema, lactation, galactorrhea, and inhibition of ejaculation are noted on occasion; photosensitivity and other allergic skin reactions may occur but are extremely rare.
Before prescribing, see package insert for full product information.

in moderate to severe anxiety, 25 mg. t.i.d.

Mellaril®
(thioridazine)

SANDOZ


at the site of infection
(where it counts)...

Ilosone® provides more antibacterial activity than any other oral erythromycin

Acid stable, better absorbed... Ilosone produces faster, higher, more prolonged blood levels, even in the presence of food[1-3]

Because it is the most active form of oral erythromycin, Ilosone can help assure consistently greater antibacterial activity at the site of infection. Ilosone produces peak antibacterial blood levels two to four times those of other erythromycin preparations.[1,2] Not only are these levels attained earlier, but they are maintained for much longer periods. Even the presence of food does not seem to affect the activity of Ilosone.[1,3]

In the treatment of patients with bacterial infections susceptible to erythromycin, Ilosone has compiled an excellent therapeutic record. Since it exerts its greatest activity against gram-positive organisms, it is particularly useful in common respiratory and soft-tissue bacterial infections. Ilosone kills—not merely inhibits—streptococci, pneumococci, and more strains of staphylococci than any other macrolide antibiotic. This bactericidal action, coupled with the high antibacterial levels attained, makes Ilosone especially valuable in patients with low host resistance, such as infants, debilitated individuals, and diabetics.

Ilosone has shown no cross-resistance with penicillin and may be effective against organisms that have become resistant to that agent. Despite its high antibacterial activity, Ilosone has demonstrated a low incidence of side reactions. Blood dyscrasias, ototoxicity, and tooth staining have not been observed. Infrequent cases of drug idiosyncrasy, manifested by a cholestatic jaundice, have occurred, but there have been no known definite residual effects.

700121

Ilosone®
Erythromycin Estolate

Lilly

(See next page for prescribing information.)

Ilosone®/ the most active oral form of erythromycin

Description: Ilosone is the most active form of oral erythromycin that has been developed. Because it is stable in acid, well absorbed, and excreted in lesser amounts in the bile, it provides faster, higher, and longer-lasting levels of antibacterial activity (ABA) in the serum, even when taken with food, than do comparable doses of erythromycin.

Indications: Ilosone is indicated in infections caused by microorganisms sensitive to its action (especially staphylococci, hemolytic streptococci, and pneumococci). The drug is therefore useful in a high proportion of bacterial diseases encountered in clinical practice and particularly in the treatment of bacterial infections of the upper and lower respiratory tract and soft tissues.

In the treatment of acute bacterial pharyngitis and tonsillitis, this antibiotic has promptly eradicated the bacteria (streptococci) and has produced a parallel prompt clinical improvement. There have been no group A beta-hemolytic streptococci resistant to this preparation. In beta-hemolytic streptococcus infections, treatment should be maintained for ten days to prevent the development of rheumatic fever or glomerulonephritis.

Erythromycin estolate has proved to be very effective in pneumococcus pneumonia and in acute bronchitis with pneumococci on culture. Bronchopneumonia and otitis media in children have responded well to its use.

The antibiotic has been used very successfully in staphylococcus infections. Good therapeutic results have been obtained in soft-tissue infections, abscesses, cellulitis, carbuncles, wound infections, and furunculosis.

In serious staphylococcus infections, erythromycin preparations should be used only in combination therapy with other antimicrobial agents. As is the case with any treatment regimen used in these severe conditions, surgical procedures should be performed when indicated, and large dosages of the antimicrobial agents should be employed. In this fashion, Ilosone has been effective in staphylococcus pneumonia, osteomyelitis, septicemia, empyema, and meningitis.

Multiple 500-mg. doses of the drug have been useful in gonorrhea and syphilis. Since penicillin is the drug of choice for the treatment of syphilis and gonorrhea, erythromycin estolate should be employed for these infections only in patients with a history of penicillin allergy. Also, other infections due to susceptible bacteria in patients known to be hypersensitive to penicillin or other antibiotics may be considered for treatment with Ilosone.

Contraindications: Ilosone is contraindicated in patients with a known history of sensitivity to this drug and in those with preexisting liver disease or dysfunction.

Side-Effects: Data obtained from seven years' use of propionyl erythromycin ester and erythromycin estolate (Ilosone) indicate that hepatic dysfunction with or without clinical jaundice may occur during or following courses of therapy with the drug.

Changes in liver function tests in such cases have been indicative of intrahepatic cholestasis. The symptoms appear to be the result of a form of sensitization. The initial symptoms have appeared in some cases after a few days of treatment but generally have followed one or two weeks of continuous therapy or several courses of the drug. Symptoms reappear promptly if the drug is readministered to sensitive patients, usually within forty-eight hours. Eosinophilia was noted in peripheral blood counts. The findings readily subsided without apparent residual effects when treatment was discontinued. Recovery was delayed in one reported instance. The physician indicated in this case that either drug-induced jaundice or viral hepatitis may have been responsible for the findings.

In one clinical study involving ninety-three patients treated with the antibiotic, three cases of jaundice were observed and an additional eleven cases developed some changes in liver function tests. Three of the patients had abnormal liver function tests a second time on readministration of the drug.

Even though it is assumed that not all cases of jaundice have been reported, it seems clear that the number is small compared with the amount of drug that has been used. Reported cases have included persons in whom there had been administered other drugs known to be associated at times with hepatic side-effects and cases in which the presence of viral hepatitis or other disease may have been responsible for the findings. In some of the cases, associated gastro-intestinal symptoms simulated the colic of biliary tract disease. In other instances, clinical symptoms and results of liver function tests resembled findings in extrahepatic obstructive jaundice. It appears that the occurrence of jaundice after administration of Ilosone is infrequent, but further investigations are being made to estimate its incidence more accurately.

In those cases mentioned above in which jaundice appeared to
be definitely related to use of the drug, laboratory findings
characterized by increased direct-reacting bilirubin, elev
alkaline phosphatase levels, negative or weakly positive ceph
flocculation and thymol turbidity tests, elevated serum gluta
oxalacetic transaminase levels, peripheral eosinophilia, and
mal cholecystograms.

Individual idiosyncrasy seems evident since jaundice has
been reported in other patients taking prolonged courses of
medication. Patients with chronic infection have been given
to 2 Gm. of the drug daily for periods of two to six months,
patients with rheumatic fever have taken prophylactic dose
0.5 Gm. daily for two years without difficulty. In one grou
144 patients who received the drug daily for two years, no ja
dice was noted. It was of interest that members of six of t
patients' families, who were not taking the drug, had epis
of jaundice during the study period.

Transaminase and serum alkaline phosphatase levels
determined in a group of fifty-four adults and children who
250 mg. of Ilosone daily for an average of sixteen month
rheumatic fever prophylaxis. The results were compared
those of a similar group of forty-four patients who received
icillin. There were no cases of jaundice in either group. Eleva
of SGPT and serum alkaline phosphatase levels during the co
of treatment was observed in one patient treated with Ilo
and in two patients treated with penicillin. Seven other pati
in the group receiving Ilosone and four others in the penic
group showed elevations in one of the tests at some time du
administration of the drugs.

Very satisfactory therapeutic results, without toxicity,
reported in 102 pediatric patients who received short-term (
day) courses of Ilosone in the treatment of streptococcus in
tions. Results of liver function tests in these patients were
parable to those in a similar control group who had rece
penicillin.

Gastro-intestinal disturbances not associated with hepati
fects are observed in a small proportion of individuals as a r
of a local stimulating effect of the medication on the alimen
tract; however, the normal intestinal gram-negative bact
flora is not appreciably altered by erythromycin drugs.

Although allergic manifestations are uncommon with the
of erythromycin, there have been occasional reports of urtica
skin eruptions, and, on rare occasions, anaphylaxis.

Administration and Dosage: Ilosone is administered orally.
Ilosone Pulvules®
Ilosone Chewable Tablets
Ilosone Drops
Ilosone, 125, for Oral Suspension

For infants and for children under twenty-five pounds of
weight, the usual dosage is 5 mg. per pound every six hours;
children twenty-five to fifty pounds, 125 mg. every six h
(Tablets Ilosone Chewable should be chewed or crushed
swallowed with water.)

For adults and for children over fifty pounds, the usual do
of Ilosone is 250 mg. every six hours.

For severe infections, these dosages may be doubled.

When larger doses are indicated, parenteral erythrom
therapy should be considered.

In the treatment of syphilis, the recommended total dosa
20 to 30 Gm. given in divided doses for a period of ten to fif
days. Close follow-up of the patient is necessary since eryt
mycin drugs have not had adequate evaluation in all stage
syphilis. Examinations of spinal fluid are recommended as
of the follow-up therapy.

For gonorrhea, 500 mg. four times a day for four days
recommended.[3] In the treatment of gonorrhea, patients wi
suspected lesion of syphilis should have a dark-field examina
before receiving antibiotics, and monthly serologic tests sh
be made for a period of three months.

How Supplied: Pulvules Ilosone, Capsules, N.F., 125 and 250
(equivalent to base), in bottles of 24 and 100.

Tablets Ilosone Chewable, N.F., 125 mg. (equivalent to ba
in bottles of 50.

Ilosone Drops, 5 mg. (equivalent to base) per drop, in 10
size packages, with dropper calibrated at 25 and 50 mg.

Ilosone, 125, for Oral Suspension, N.F., 125 mg. (equiva
to base) per 5-cc. teaspoonful, in 60 and 150-cc.-size packa

References: 1. Griffith, R. S., and Black, H. R.: Am. J. M. Sc., *247:*69,
2. Griffith, R. S., and Black, H. R.: Antibiotics & Chemother., *12:*398,
3. Hirsch, H. A., Pryles, C. V., and Finland, M.: Am. J. M. Sc., *239:*198, 19

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*As shown by *in vitro* studies.
1. Crunden, A. B., Jr., and Davis, W. A.: Am. J. Obst. & Gynec. *65*:311 (Feb.) 1953.

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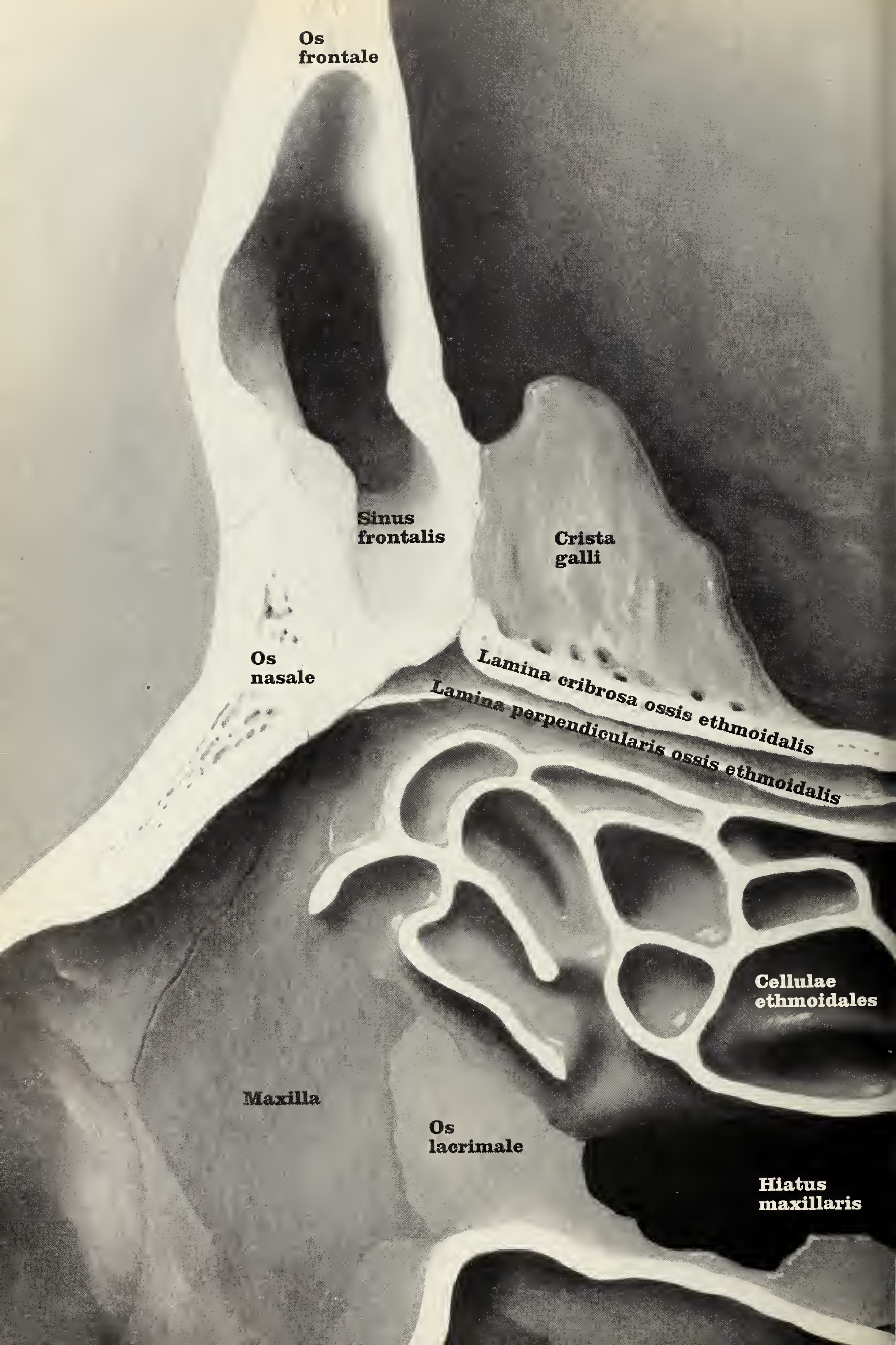
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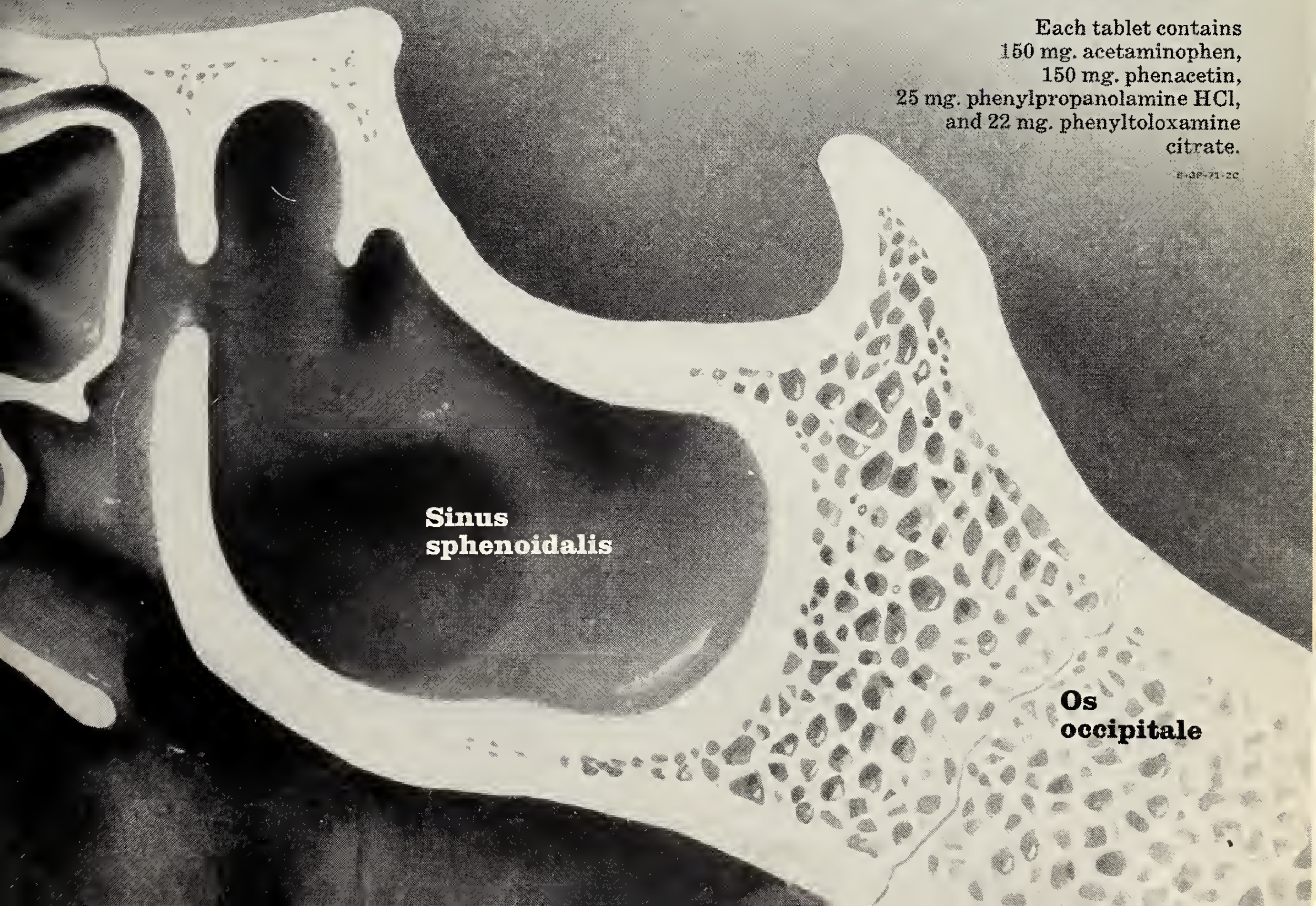


viewpoints

YOUR VIEWS INVITED

BY DON MARSHALL, M.D., CHAIRMAN
MSMS EDUCATION LIAISON COMMITTEE

Today there is no argument about the need for more workers in the health field. All agree that we need more physicians, and physicians need all the helping hands they can find. With increasing population, increasing demand by an affluent society for the latest and best in medical care, demand by the rest of society for good medical care as a right rather than a privilege, need for medical care for our military forces, and with the increasing number of positions open for teaching and research and administration in the field of medicine, all medical personnel are in short supply.

Two lines of action can meet the need: (1) make the work and capacity of existing personnel more efficient so it can cover more people, and (2) produce greater numbers of personnel.

To measure the need and define the solution is easy; to produce results is more difficult.

The federal government and the AMA both recognize the need. Both have committees on health manpower. The Michigan State Medical Society, through its Education Liaison Committee, has a Subcommittee on General Practice Education, headed by J. B. Rowe, M.D., Flint, now at work on the problem of encouraging more physicians to enter the field of family practice. Another subcommittee, on Paramedical Education, headed by H. J. Meier, M.D., Coldwater, is studying the most effective way in Michigan to obtain help for the busy physician. The three medical school deans or their representatives serve effectively with all three groups.

Results of the work of all the groups at national and state levels are disappointingly slow. Workers are needed today, and talk is useless without ultimate results. But in considering immediate and long-range solutions, many questions must be answered.

Where are new workers to be recruited?

What type of school and what type of teacher should train them?

How can positions of occupational and physical therapists, record librarians, electronics technicians, and many others be made competitive with the industry that is seeking the same type of individual?

Do we need to develop new curricula?

If new types of workers are trained, such as a physician's assistant, will they be readily accepted and used by the present health team?

Will legislation be needed to legalize and license a new type of worker?

Is there any danger that workers in the health field at various levels will tend to overstep their abilities?

Can an educational system be evolved that will allow flexibility both vertically and horizontally into related fields of activity and research?

These are the problems to be solved. If you have opinions or ideas to help, the MSMS Education Liaison Committee would be happy to hear from you.

THE SPEEDING AMBULANCE

BY CARL M. HANSEN, M.D.
STANTON

Many times have I been awakened in the darkness of a strange city by the eerie wailing of a siren. This sound has always caused me to experience a very peculiar feeling. It is a sound which is used to denote peril. It is an indication of possible danger to life, limb, or property.

It is a warning to all who hear it that an emergency exists, since sirens are only used on so called "emergency vehicles." The police are en route to the scene of an accident, firemen are hastening to the scene of a fire, or an ambulance is making a run to aid a patient needing treatmen for a dire emergency. In all of these circumstances the individuals riding in or on these vehicles, the police, the firemen, the ambulance attendants, and he patients are subjected to certain hazards due o the fact that an emergency condition does exist.

However, they are not the only individuals sub-cted to risks due to the emergency. These risks re also shared by others who are using the streets nd highways during an emergency.

In time of war our military leaders are apparent-y well aware of the risks involved during combat perations. Decisions must be reached in regard "calculated risks" in given operations. These isks are very carefully evaluated prior to commit-ent of our soldiers to battle. Shouldn't consider-ble thought be given to "calculated risks" re-erable to civilian emergencies? Can we always ac-ept the fact that a true emergency exists when we ncounter a speeding ambulance with its siren hrieking and the red lights flashing?

I have noted ambulances speeding and being andled in what I considered to be a very reckless nanner. Apparently, for the sake of saving a few econds in time, they have crossed yellow lines and ave gone through red lights at busy intersections.

I have observed narrow escapes for ambulances n traffic when the drivers were proceeding reck-essly without due regard for the safety of their assengers and for the safety of passengers of ther vehicles on the highway. I am aware of everal instances in which the reckless driving of mbulances has resulted in the loss of life to the mbulance driver, to his passengers, and to the assengers of other vehicles.

One of my colleagues recently revealed to me he following experience:

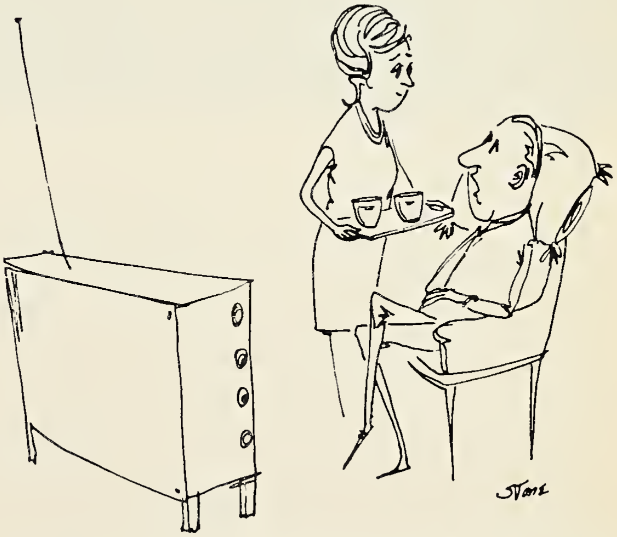
While driving along a main highway at legal peed, he was overtaken and passed by an am-ulance traveling at excessive speed, with red ights flashing and siren screaming. He gladly ulled over to allow the speeding ambulance to ass him. It was his belief that he was assisting he ambulance driver to hurry the ambulance on ts way in order to save the life of some un-ortunate individual needing emergency care. Some ight or ten miles further down the highway my olleague stopped to replenish his supply of gaso-ine. During this stop he chanced to see the ambu-ance which had passed him parked nearby. He valked over to the ambulance, and inside he noted patient lying contentedly on the ambulance cot, uffing on a cigarette and calmly reading a news-aper, his right leg enclosed in a plaster cast. asual inquiry revealed that the patient had suf-ered a fractured leg some six to eight weeks pre-iously and was enroute to a hospital to have the cast removed. Was this an emergency run by the ambulance which required excessive speed, screaming siren, and flashing red lights?

An ambulance ostensibly has been designed to provide safe and comfortable transportation of an ill or injured individual. The few seconds saved by reckless or illegal driving of such a vehicle do not appear to be of definite significance, in most instances, regarding specific treatment of the patient. Such driving has proved to be very dangerous and detrimental to other individuals on the highway as well as to the occupants of the ambulance.

In the case of seriously injured patients, my personal experience has revealed that the few seconds, or even minutes, have proven to be usually of little or no consequence regarding the patients' eventual outcome. Many patients seriously injured have been pronounced DOA (dead on arrival) at time of admission to a hospital. I am inclined to believe, in many instances, that the same diagnosis might have been made by a competent doctor had he seen the individual at the scene of an accident, prior to the wild ride to the hospital in the ambulance.

Who should be responsible for the decision regarding "calculated risks," the ambulance driver or the responsible citizens of a community?

It appears to me, following many years of experience as a county coroner and as chief of



"I don't know if it's just me or the programs but this year I'd rather make house calls than watch TV."

—reprinted with permission from
Westchester Medical Bulletin, New York

surgical service at several hospitals, that the "calculated risk" should be determined by citizens at large, rather than by the ambulance driver. The driver apparently feels, and with deep conviction, that he is duty-bound to get the patient to the hospital as *fast* as possible. It seems to me to make little sense on the part of the driver to sit at a red light while a patient bleeds profusely or cannot breathe properly when there is no other traffic. Neither does it make sense for the driver to proceed recklessly at excessive speeds endangering the lives of other people on the highway.

Perhaps it is time for us to give this problem serious consideration and come up with the correct answers with legal controls regulating the way by which patients are transported by ambulances.

ROLE OF THE JOURNAL

BY GEORGE H. LOWREY, M.D.
SCIENTIFIC EDITOR

It has been estimated that there are about 7,500 medical journals being published in the world at the present time. This is a staggering figure which indicates not only the growth of medical knowledge but also the great difficulty in disseminating this knowledge to all people who can use it.

Between 80 and 90 percent of all scientists who have ever lived are still alive today. However, in the next 15 years as much scientific work will be produced by as many scientists as has been accomplished in the entire period of recorded history up to the present time.

With all of the scientists producing all of the work there would seem to be an adequate reason for many types of medical journals including such a one as *Michigan Medicine*. It was recently stated in an issue of *Medical World News* that the state journals get only the dregs of the papers that are submitted for publication. A survey quoted by that publication indicated that few specialists read the state journals. If these facts are true, it raises a serious question as to whether there is a need or even an excuse for continued publication of *Michigan Medicine*.

Medical journals are published for a number of purposes. Some of these exist primarily for the writer of scientific articles. Although it is probable that no single publication is created solely with this purpose in mind, there are increasing numbers of journals which are published simply so that the writer can have his article in print and added to his bibliography. These journals are the answer to the academicians' problem "publish or perish." Their content seldom interests the practitioner.

Most journals are published with the purpose of informing the physician of new developments and their practical applications. Nearly every specialty has at least one or two journals of this type published in this country.

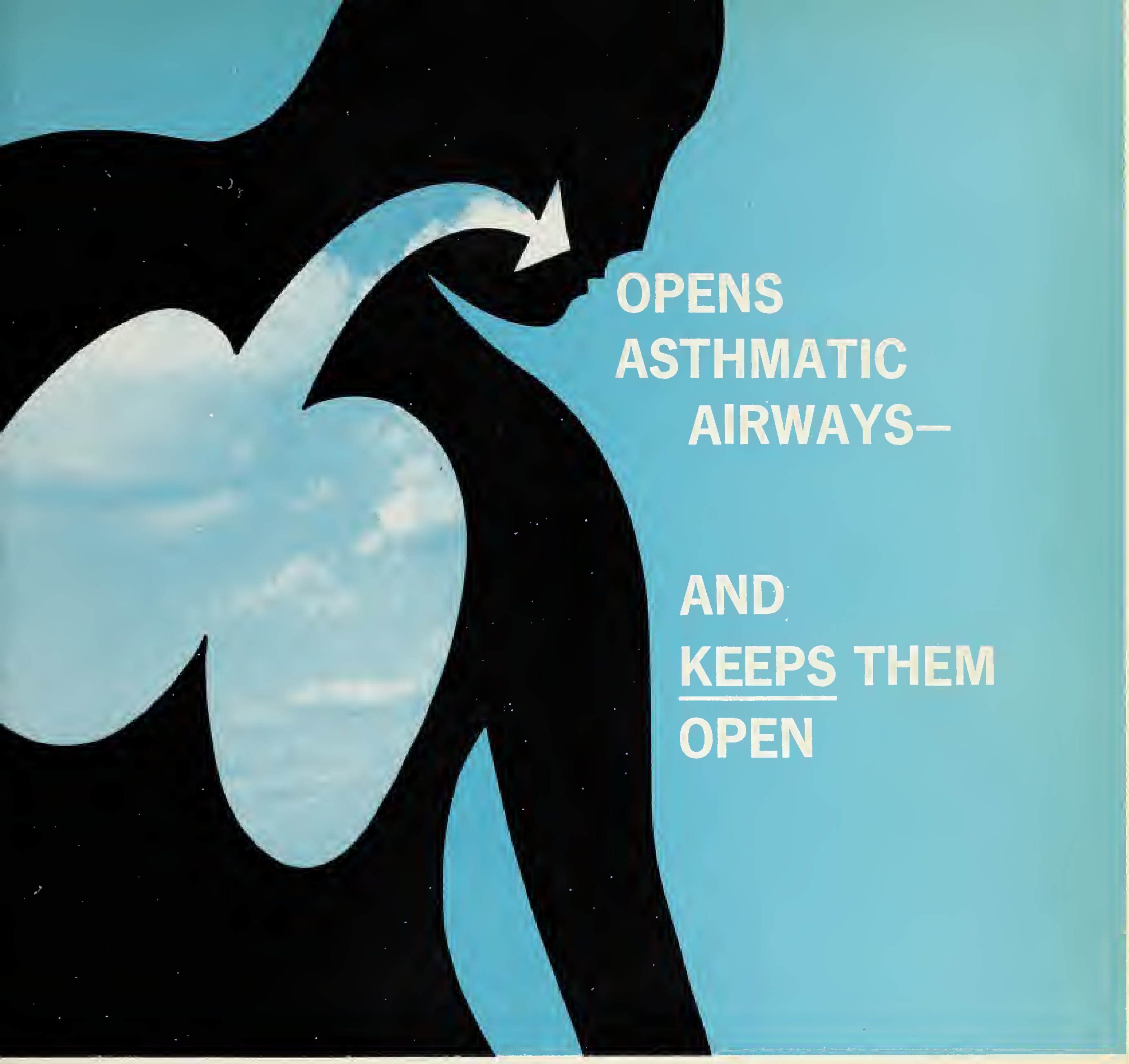
Michigan Medicine and most state journals probably fill the third category of medical publications. They do provide useful information and its practical application. In addition to this they include a good deal of information that is not related to the practice of medicine in a scientific way; rather, they report important aspects of economic, political, and personal matters.

Although it is certainly true that one would not expect to find world-shaking innovations first reported in *Michigan Medicine,* the journal has established itself as a highly reputable organ. Its primary area of distribution is in the state of Michigan; however, it is sent to every medical school in this country as well as a number of foreign medical schools. In addition, a large number of medical libraries that are not connected with medical schools subscribe to it. In reviewing the articles that have appeared over the past few years, considerable pride can be taken in their caliber. A number have been abstracted or reprinted in toto in national review journals.

A very definite advantage to authors who submit original material to *Michigan Medicine* is the early publication date that is possible in contrast to the time usually required in national or international publications. The Publications Committee welcomes controversial papers as long as they have the merit of being based on well-considered opinion or experience on the part of the authors. Review articles of rapidly developing fields of medicine are also invited.

Publication in the MSMS journal serves another important purpose. It is an ethical means of letting other doctors know of one's particular interests.

We hope that each member of the Michigan State Medical Society takes pride in his Society. It is members' contributions that will help to maintain and continue to improve *Michigan Medicine.*



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INVITE DOCTORS HELP PTA IN HEALTH PROJECTS

Michigan physicians can help promote good health among children by offering to assist health chairmen of the many local PTA units in carrying on important community projects in the field of health.

An ambitious work program has been outlined for the next two years by Mrs. Charles R. Palmer, Parma, Health Chairman of the Michigan Congress of Parents and Teachers.

Among the numerous activities, Mrs. Palmer recommends that local PTA Health Committee Chairmen:

(1) Work toward improving alcohol education in schools so that young people may learn from qualified teachers the most recent, objective knowledge about the relation of alcohol and its use to physical and mental health. Also, give attention to other critical areas of health education, such as smoking, use of stimulant and depressant drugs, and venereal disease.

(2) Encourage well-qualified students to prepare for careers in health.

(3) Eliminate measles, which cripples and kills children.

(4) Plan a project aimed at keeping seventh and eighth graders from starting to smoke.

(5) Work for the flouridation of public water supplies and all other available means of reducing dental caries in children.

BEGIN CANCER FOUNDATION CRUSADE FOR 1967

The Chairman of the Michigan Cancer Foundation Crusade for 1967 is George W. Miller, President of the Bank of the Commonwealth. Mr. Miller's appointment was announced by Leonard N. Simons, Chairman of the Foundation's Board of Trustees.

The Michigan Cancer Foundation, a member of the United Foundation, is an educational organization for the gathering of scientific information to aid in a quicker arrest of cancer. Mr. Miller will coordinate a task force of 20,000 women in an extensive house-to-house survey of 250,000 housewives to obtain data for long-range study of the causes of breast cancer. The survey questionnaire is compiled by the research division of the Michigan Cancer Foundation.

Begun in April, to coincide with President Johnson's proclamation declaring April to be Cancer Control month, the 1967 Crusade covers Wayne, Oakland, Macomb, and Monroe Counties.

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This scene is from a new educational film, "How Much Is a Miracle?" which depicts the founding and growth of the Eli Lilly and Company. The film is available free through Modern Talking Pictures, Inc. for showing by groups.

Recalls Early Michigan Efforts in TB Control

"Michigan had the first state law providing for tax-paid hospitalization for tuberculosis patients. The first tuberculosis sanitarium provided by Michigan was built at Howell in 1905. By 1960 there were other sanitariums at Gaylord, Kalamazoo, and Hancock, a tuberculosis unit at the University Hospital in Ann Arbor, and fourteen approved county, city, and private tuberculosis hospitals. Free chest X-rays were provided for the early detection of tuberculosis.

"Several Michigan doctors, including Dr. John Alexander and Dr. Cameron Haight of the University of Michigan, and Dr. E. J. O'Brien of Detroit, were pioneers in the field of chest surgery for the treatment of the disease. The use of antibiotics was another factor in reducing the death rate from tuberculosis in Michigan from 103 per 100,000 in 1900 to 5 per 100,000 in 1958. So rapid was the decline of tuberculosis as a major killer that in 1959 a large number of beds in the state sanitariums were turned over for the use of patients from the state mental hospitals who needed care but not treatment, mainly senility cases.

quoted from *"Michigan"* by Willis Dunbar; published by Eerdmans

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Community Medical Center, Flint, Michigan

The 12-suite Community Medical Center at 3717 Van Slyke at Executive Plaza in Flint is nearing completion for June 1967 occupancy. Features include efficient floor layout, individual reception rooms, private consultation office, independent heating and air-conditioning units, individual or joint suites for single or group practice or reciprocal relief, and many others.

If you are interested in practicing in Flint in a professional atmosphere where the heavy traffic pattern is already assured through existing leases, please contact

—J. C. Natchez, 3017 S. Saginaw Street, Flint 48503, or telephone 313/238-0451; or

—Michael A. Magnotta, 511 Tussing Building, Lansing 48933, or telephone 517/482-4164.

Offers Two Suggestions on Ways to Impr Equal Employment Opportunities in State

BY ELMER E. WHITE, MEMBER
MICHIGAN STATE ADVISORY COMMITTEE
TO UNITED STATES COMMISSION
ON CIVIL RIGHTS

The blunt fact is that the nonwhite citizen does not frequently get a fair chance when he enters the employment market in Michigan.

As a member of the Michigan State Advisory Committee to the United States Commission on Civil Rights, I was exposed to many aspects of this proposition. And although my opinions here are strictly my own, I do not see how any open-minded person could conclude otherwise, once exposed to the same information.

The trouble is that most of us are not often exposed to the information and find it too easy to push it to the back of our minds when we are. This leaves the nonwhite, the youth especially, isolated with his problem. Some of them are oblivious, some resigned, some frustrated, some resentful. A growing number seethe with their situation.

The nonwhite often finds "built-in" machinery which keeps him from getting a job he could have if he were white. This is subtle discrimination, some of which developed almost unconsciously. But it is still effective.

ONE OF THESE factors is the location of his housing. A Negro who cannot live near a job and cannot afford a car might find that public transportation is unsuitable or at least a sizable handicap. This is one reason why more Negro people do not apply for jobs as sales people in new shopping centers.

Without ever referring to color, apprenticeship programs which have been approved by the United States Department of Labor are set up in such a way that it is difficult, if not impossible, for a Negro or Indian youth to fit into a training program.

Although union leaders seem honestly anxious for integration in the unions they represent, union members do not follow enthusiastically. It can be questioned whether they follow at all. One need only look into the ranks of skilled labor — carpenters, electricians, plumbers, printers — to see a great void of nonwhite workers.

ANOTHER SUBTLE situation the Negro faces is getting a job against competition in a place where much hiring is done by word of mouth, where the employer asks workers to recommend their friends or relatives for jobs. Since there are no Negroes in such places, they don't even hear of the jobs.

It is my feeling that most white people do not really concern themselves with this problem. If they did, their sense of fair play would stimulate them to do something about it.

It is true that lately there has been a demand for highly trained Negroes. It is almost fashionable to have a few on the payroll of large companies. It is also true that a growing number of Negro young people who are not college-trained are having an increasingly hard time finding jobs.

The Negro American is probably more interested in the equal opportunity to earn a good living than in any other right. This is closely related to his desire for better housing and more education.

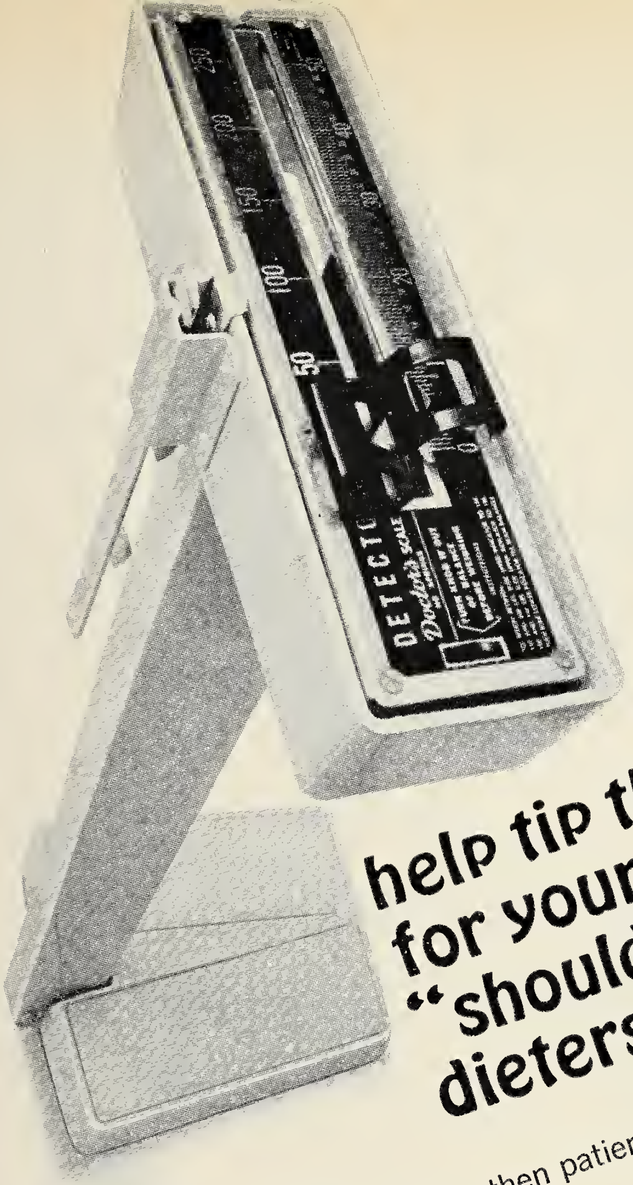
WHITE PEOPLE of this state would do well for purely selfish motives, if no other, to consider the situation of the young Negro, to try and understand his frustration, to help him solve his problem.

Until the nonwhite people of Michigan can get more and better jobs, they constitute an economic loss of potential and an economic burden. Their frustrations and discouragements could become so severe that they become easy marks for rabble rousers.

I would like to see everyone have the same real opportunity for a job which suits him, not because of fear or sympathy, but because the present circumstance is basically unfair and contrary to the goals which we like to believe are foundations for this great country of ours.

THE FIRST STEP is to stop fooling ourselves: Face up to the fact that nonwhite people find many subtle barriers between them and jobs they could have were they white.

The second step is to be willing to lend support for the idea that both obvious and subtle discrimination should cease and that nonwhites should have every opportunity white people have



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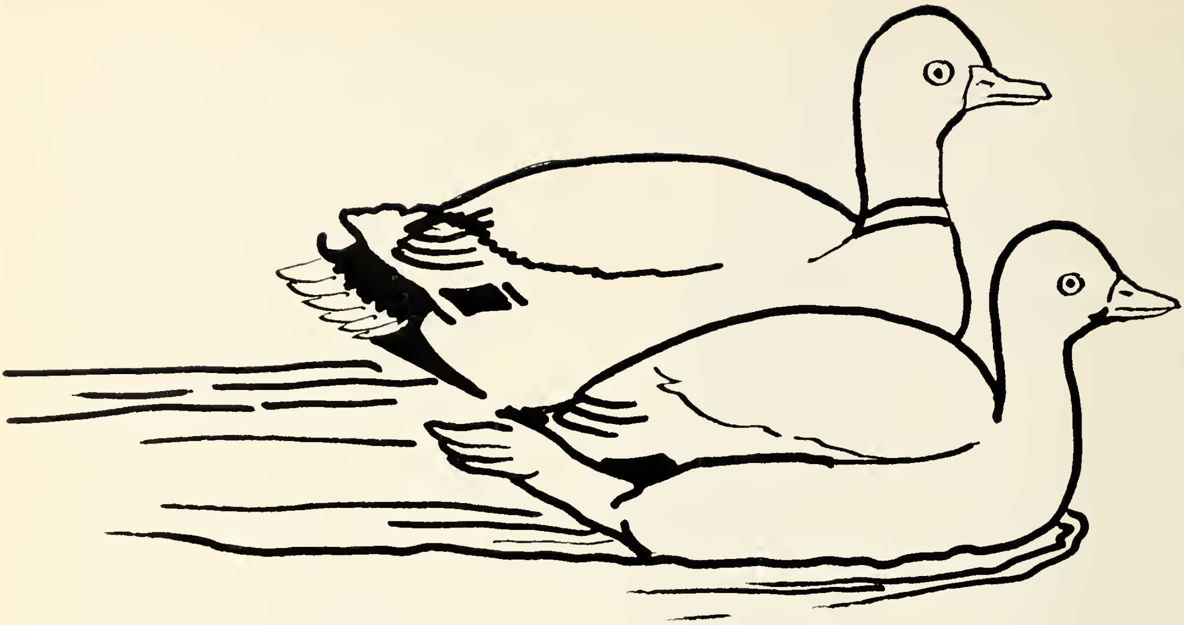


New 10-Year State Plan For Outdoor Recreation Urges Action Now for Capital Outlay

Michigan physicians — as taxpayers, as travelers and as sports enthusiasts — will be interested in a new Michigan State Department of Conservation Ten-Year Plan for Outdoor Recreation.

The Plan brings into focus the broad and extremely varied aspects of outdoor recreation. It includes an inventory of the Michigan recreation base and the existing areas and facilities, an analysis of the present needs and projected demands, a statement of goals, and recommendations for implementing the goals through action programs. It envisions a coordinated "system" of outdoor recreation facilities involving participation by all levels of government as well as by private and commercial enterprise.

In projecting the need for the Plan, the publication declares:

"Our most critical need is for land and facilities to serve the concentrations of city dwellers who must be able to find more recreation opportunities within their daily living environment, within 1 30, and 60 minutes from home. But the needs als include continued expansion and improvement c distant facilities to serve an increasingly mobil population seeking variety and opportunity awa from home, whether on an all-day trip or an e tended vacation. Cleveland, Detroit, Chicago, Mi waukee, and Indianapolis all feed this deman The action which we take must be compounde of creation, preservation, and restoration. It mus respond to the mood of the people and set ma and his use of land and space in right relatio ship."

Ralph A. MacMullan, Director, State Depar ment of Conservation, writes, "This continuin plan for outdoor recreation development shoul be looked upon as a prelude to future plannin work in which many people and agencies will b involved.

"Although Michigan has been blessed with great wealth of natural resources, the developme of recreation facilities has not kept pace with th tate's population and economic growth. Preservation and development of our recreational, scenic, nd historic sites is of the utmost importance to ur well-being and that of future generations. Likewise, provision of open space in our cities s essential if they are to be satisfying and rewarding places in which to live.

"It is imperative that we act now — before it is oo late. This and future generations will recognize our foresight in preserving and passing on n irreplaceable legacy of recreation space, unluttered land and clean water."

The new report of the Conservation Department iscusses the nature, extent and condition of our utdoor recreation facilities, the problems facing s, and proposals for a course of action. It is an nitial accomplishment in the continuing work on Michigan's broad, long-range Plan for Outdoor Recreation.

The task of preparing the Michigan Outdoor Recreation Plan has been assigned to the Recreation Resource Planning Division of the Conservation Department. The Plan is, in turn, one phase f the total State Resource Planning Program, and t provides the basis for qualifying for Federal assistance under the Land and Water Conservation Fund Act.

LAND USE CHANGE

The publication provides statistical information bout the land, lakes, streams, forests and wildlife. Regarding land use, the report states:

"Dynamic changes in Michigan land use, on large scale and small, characterize the age. Urbanization, decrease in farm land, and 'scatteration' of esidential and other urban land uses over the rural landscape are dominant trends. Predictions for 1980 estimate a third less land in farms than n 1960, half again as much urban and suburban and, and a fifth more forest and recreation land.

"Southern Michigan will not be one vast city n 1980, despite the apprehensions voiced by many. Urban and suburban areas should not require nore than 20% of this one-third of the State. Decrease in farm lands will help meet the demand for recreation and urban development.

"Growing numbers of families with increasing affluence will mean more land in second homes and private recreation reserves. Many lands will serve multiple purposes, with private and public timberlands yielding recreation, and with working farms providing sport and vacations. Even urban streets will offer benches, fountains and malls to make city living more enjoyable."

Recreation pressures, the publication reports, include population, income, mobility, leisure time and the interaction of these to assure "striking growth in recreation demand."

The pressures also include technological advances and various socio-economic factors. (These other factors are of special interest to physicians because they relate to medical care and facilities.)

The report, in part, continues:

"The social and economic system in Michigan, is in process of flux, growth, and reshaping.

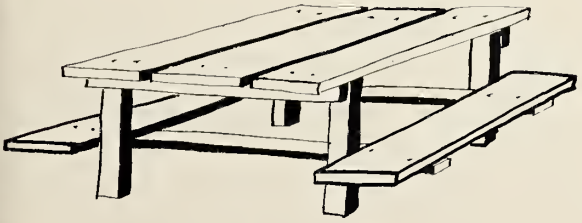
"1. Density of population is increasing, with more people occupying the same amount of land. The southern third of the State contains 87% of the people; 50% live in four southeastern metropolitan counties. Density has a wide range. Detroit now averages 11,964 people per square mile, Keeweenaw County 4. Recreation needs and problems relate directly to the degree and manner in which people are crowded into cities or scattered over the land.

"2. Education influences tastes in recreation. People are staying in school longer, getting more years of education and training. In 1940, our people over 25 years old averaged 8.8 years of schooling. By 1960, this had increased to 10.8 years.

"3. Age structure is not changing rapidly, but it must be recognized that each age has its own recreation needs and interests: 42.0% of the population is under 20, 8.4% over 65.

"4. The family as the basic unit of society needs greater recreation opportunities today than ever before.

"5. But youth, in small and large groups, in neighborhoods and away from home, are more and



"Even urban streets will offer benches, fountains, malls . . . "

"State falling short of meeting needs of people."

more pressing upon us their need and desire for constructive leisure time activity.

"6. Other special groups are increasingly recognized as needing special recreation provisions.

"7. The underprivileged receive recognition now as never before, as do the needs of the mentally retarded and the physically handicapped.

"8. In all these fields, local, State and Federal governments as well as private foundations are taking new steps in recreation."

MANY ISSUES, PRESSURES

The report evaluated the issues and problems involved in efforts to better meet the needs and desires of Michigan residents.

In part, the publication states:

"Michigan is richly endowed with natural resources and scenic beauty that have long been valued for outdoor recreation. In spite of its proud heritage of conservation activities and a dynamic growth of recreation facilities, the State and its subdivisions are falling short of meeting the day-to-day and vacation needs of our urban populations.

"To develop a coordinated outdoor recreation system to meet these needs we must tackle many issues and identify many problems.

"Inadequate money to do the recreation job: Competing uses for limited funds; Lack of long-range financing; Skyrocketing land and development costs.

"Pressure of people on resources: Depreciation of recreation attractions from over-use; Lower returns per fisherman and hunter; Loss of huntable lands through private land posting; Competing land uses; Competition and conflict in water surface use; Local roads over-burdened by recreation traffic.

"Insufficient planning for resource uses: Weak and 'too late' zoning; Lack of coordinated inter-agency action; Northwoods blight and cottage slums; Loss of recreation values by roads and power-lines; Lack of basic standards of evaluation — people per acre, boats per acre, swimmers per foot of water frontage, ratio of open to built-up land, etc.

"Low level of appreciation of values of recreation: Tendency to measure all recreation values by amount of use rather than by quality of site and experience; Lack of local interest and understanding of outdoor recreation needs and benefits; Poor maintenance of many existing facilities; Destruction of fish and wildlife habitat through 'clean farming,' dredging, filling, pollution; Subdivision planning which fails to reserve open space and recreation land, and incorporates unwise land use.

"Inadequate facilities to meet the demands: Lack of space for day-use in and near cities; Shortage of camping and boating facilities; Scarcity of one-night 'travel camps' on main highways.

"Lack of respect for what we have: Prevalence of vandalism, litter, junk yards, pollution."

THREE MAJOR GOALS

The Department grouped all goals into three broad ones:

"It is a basic premise that recreation is a necessary and motivating force in our individual lives and essential to the social and economic well-being of our communities and the state as a whole. A statement of goals, based on this premise and derived from determinations of needs and demands, must guide a program of action. The realization of the potential of Michigan's recreation future depends upon how well and to what degree we accomplish these goals.

"The fundamental goals are:

"1. To improve the quality of living by providing clean, pleasant open space and adequate outdoor recreation facilities for the citizens of Michigan and its visitors, placing particular emphasis on meeting the needs of urban population.

"2. To make wise and fullest use of our natural resources and to maintain and strengthen the ingrity of conservation practices in the face of pres- ires for over-use or conversion to other uses.

"3. To coordinate the activities and programs the several state and federal agencies, local jur- dictions, organizations and private owners having creation interests, opportunities and responsi- lities."

SKS $375,950,000

The Report suggests some financing possibilities. he Report says, "They represent increases only presently established sources of revenue — hunt- g and fishing license fees, park user fees, and aterway's share of the gasoline tax."

The proposed 10-year capital outlay program r land acquisition and development includes the llowing:

Fisheries	$49,000,000
Forest Recreation	7,050,000
Wildlife	26,350,000
State Parks	150,000,000
Waterways, Boating	84,550,000
State Grants to Local Units	60,000,000
Grand Total	$375,950,000

The Conservation Department's 10-Year Program sults from the identification of a goals frame- ork. "The function of the Action Program is set before the public concrete proposals for ecific things which can be accomplished over given period of years to make progress toward e goals," declares the Department in the Report.

The Report continues, "The 10-Year Plan is tually a segment lifted out of a still longer range plan, in that the work accomplished during the period will provide recreation lands and facilities which will be useful far into the future, and will accomplish certain actions now, particularly in the field of land acquisition, which would not be feasible in future years.

"The scope of this 10-Year Plan includes primarily a capital outlay program, driving toward on-the-ground accomplishments. A more complete program will eventually deal with the problems of costs of operation, maintenance, management and administration."

URGE CITIZEN HELP

The Report calls for citizens — individually and through organizations — to act in the following ways:

"Promote the achievement of local and statewide outdoor recreation goals outlined in the Report;

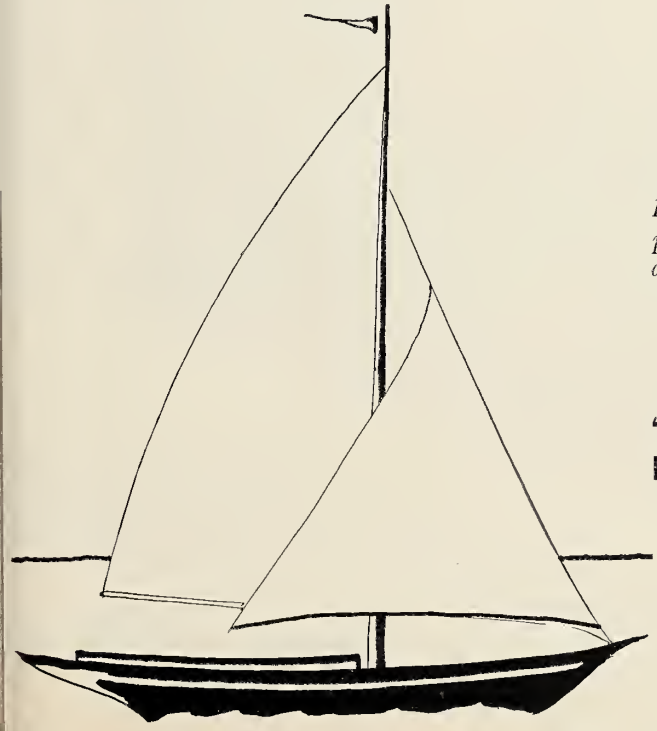
"Support continuing long-range state and community planning as the basis for orderly program development;

"Work directly with state and local governments and planning bodies in influencing policies, budgets, and legislation;

"Perform education and information functions relevant to outdoor recreation areas, facilities, needs and programs;

"Provide a sounding board to identify problems, generate ideas, suggest goals, review alternatives, participate in program selection, and support means for putting a plan into action."

(A copy of the booklet "Michigan's Recreation Future" may be obtained from the Michigan Department of Conservation, Lansing, to learn more about Michigan's Plan for Outdoor Recreation.)



"Ten-year plan part of still longer-range plan."

book reviews

It All Started With Hippocrates

(By Richard Armour. 136 pp., illustrated. $3.95. McGraw-Hill Book Company, New York, 1966.)

The author of this book has written a number in a similar vein, usually having some historical or literary background. Richard Armour was a professor of English at Scripps College for many years, and from this one might anticipate a deep satirical presentation.

It All Started With Hippocrates is an entertaining presentation of the history of medicine. Many times, however, the humor is rather forced and there is little knowledge or fresh approach to either the philosophy or ethics of medicine. There are many puns and some outrageous footnotes. It probably is the type of book that would appeal more to the layman than to the physician. In any case, it is quite typical of the genre we now refer to as "bedside reading."

As reviewer and editor, the following paragraph is especially appropriate:

> "The increase in medical information has made necessary an even greater number of medical journals. These are useful around the house to prop open doors and put under leaky flowerpots. Some of the thicker volumes serve nicely to place on a chair and raise small children at the dinner table. Even better than medical journals as a way of being brought up to date on new developments are medical conventions. These are held in central locations like Miami Beach and Honolulu, where doctors go to read papers, there not being time enough to read the paper at home."

George H. Lowrey, M.D.

Consumers Union Report On Family Planning

(Second Edition. 191 pp. $1.75. Consumers Union of the United States, Inc., Mount Vernon, New York, 1966.)

This is the second edition in paperback form of a guide that was first published a number of years ago. Although it is fairly brief, it is quite complete, even including a state-by-state listing of organizations that can give advice on family planning. The three major fields that are covered are contraception, fertility, and adoption.

The material on contraception is excellently presented. Since one of the individuals who helped to prepare the report was Doctor Alan F. Guttmacher, its reliability and accuracy are beyond question. The various techniques are described, and this description includes the degree of effectiveness, cost, the ease of use, and other features such as side effects, both physical and psychological.

The section on fertility presents an adequate explanation of tests and medical techniques to improve the prospects of childless couples, and it discusses the pros and cons of artificial insemination.

The procedures to follow in adopting a child, and especially the pitfalls to avoid, are well-presented. A chapter on adopting a child from overseas as well as one on interracial adoption are valuable additions.

This reviewer found this an excellent book, covering the material briefly, but adequately. It can be recommended for patients as well as for physicians. There certainly is no commercialism apparent in this venture. The language is straightforward, and the presentation is uncomplicated. An average high-school student could certainly read this and understand it. On the other hand, its presentation is not so condescending that it would be boring to a person of more advanced education. It can be strongly recommended.

George H. Lowrey, M.D.

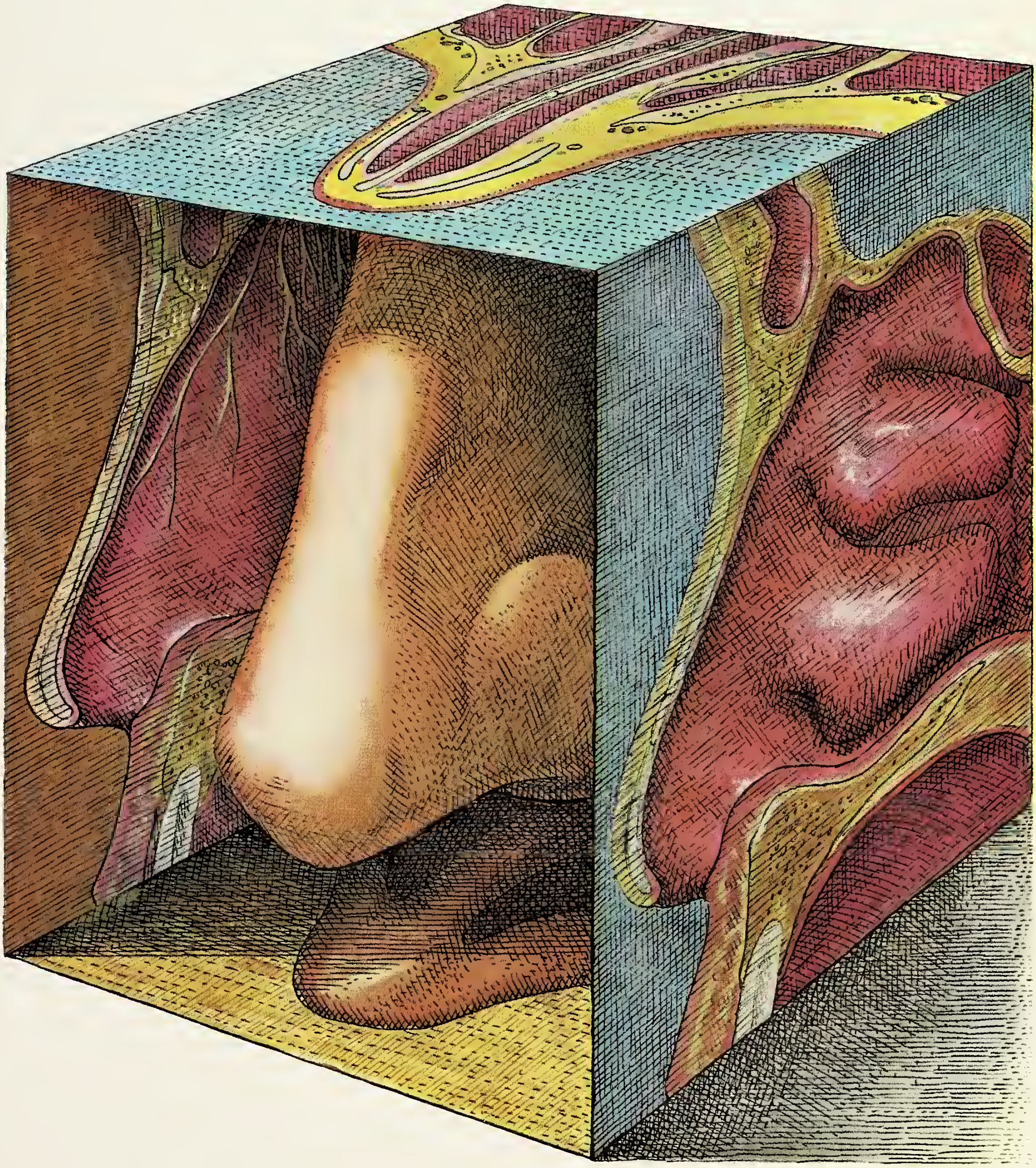
MICHIGAN AUTHORS

A. Jackson Day, M.D., Detroit; James A. MacDonell, M.D., Grand Rapids; and Herbert E. Pedersen, M.D., Dearborn, "Recurrent Dislocation of the Shoulder," *Clinical Orthopaedics,* xl (1966).

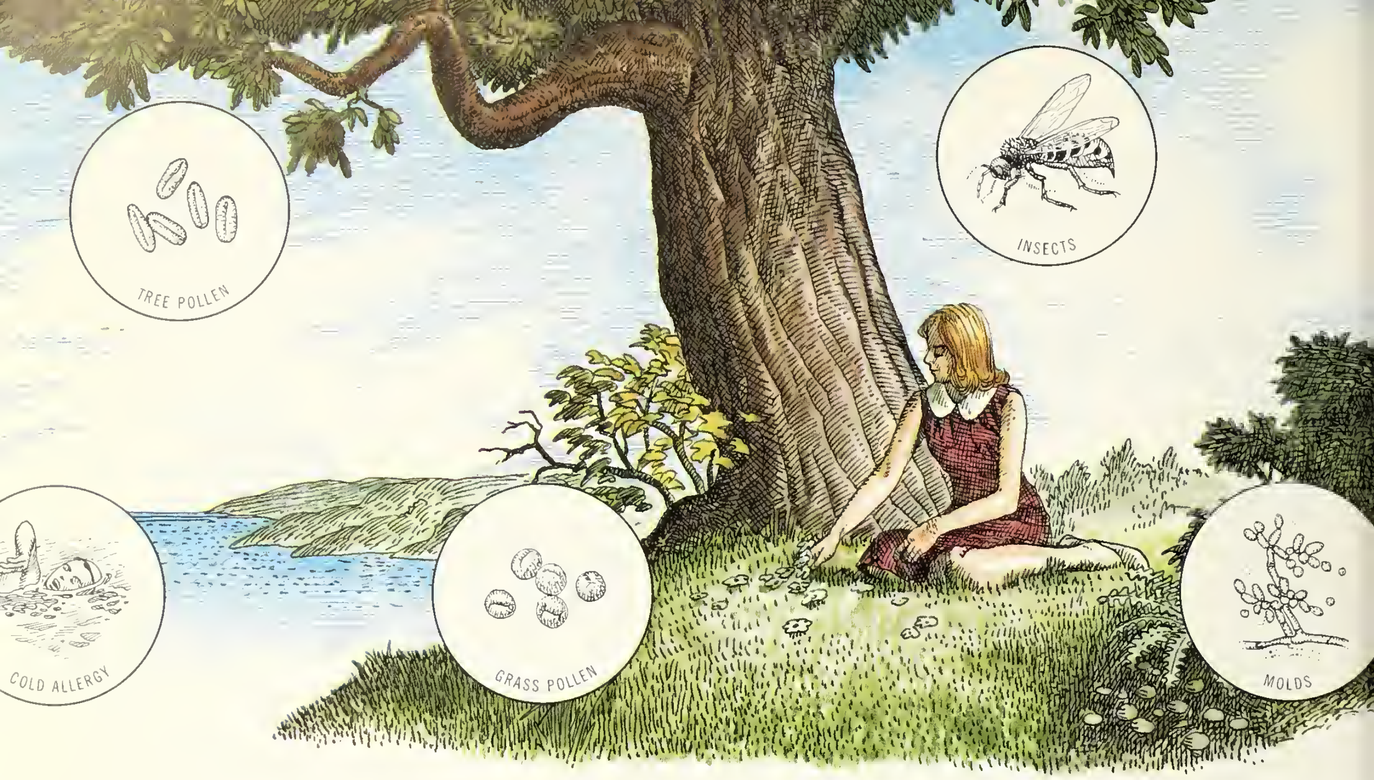
spring 1967

DORSEY Season

A journal within a journal published quarterly in the interests of better medicine by Dorsey Laboratories, a division of The Wander Company, Lincoln, Nebraska. Address communications to Raymond C. Pogge, M.D., Director of Medicine.



this issue: the ubiquitous world of summer allergies



the ubiquitous world of summer allergies

Donald L. Unger, M.D. • Clinical Assistant Professor, Department of Medicine (Allergy), Stritch School of Medicine (Loyola).

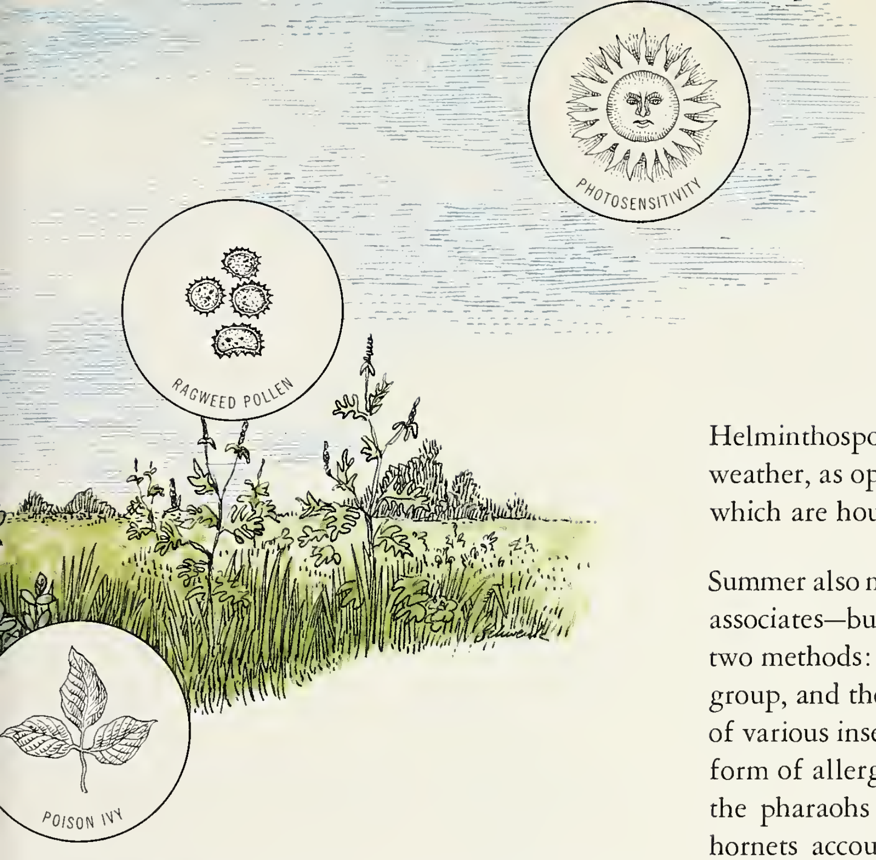
In the Spring a young man's fancy lightly turns to thoughts of—allergies. This is at least true of the 10% of the population who have hay fever and the 4% who have asthma.[1] The snow melts, the trees blossom and the noses run. Patients who were fine all winter may not be enthralled by the sight of the first robin or the blossoming of a crocus, for their appearances may precede the "sneezin' season."

Allergies in general can be divided into winter allergies and summer allergies. In the winter the main problems are inside the house: e.g. dogs, cats, dust and feathers. Houses in the northern half of the country become so dry that it becomes essential to add humidity to the home; this is a far cry from the damp summer months with the moldy basements and need for dehumidifiers.

Early in April trees begin to pollinate, with each tree having about a two week period of pollination. A particular patient may be sensitive to only one tree and thus have his hay fever for such a short time that he thinks he has a cold.[2] The entire tree season starts about April 1 and ends about Memorial Day, although all hay fever seasons are blurred and prolonged in the southern part of the country. Tree pollen is usually very heavy and a person may well have most of his exposure from those trees immediately surrounding his home.

Grasses pollinate from about May 15 until July 4, and cause "rose fever." Grass pollens are somewhat lighter and more buoyant than tree pollens, and are much more ubiquitous. While there are several varieties of grasses in the United States, they are so closely related antigenically that a person sensitive to one is generally sensitive to them all.[3] Thus, while the tree season is really several small seasons intertwined, the grass season will usually result in symptoms for a more prolonged period. Obviously, a grass-sensitive patient will have trouble only when grass is pollinating—he will have to think of another excuse not to mow the lawn after July 4.

Ragweed is the "Big Daddy" of them all in the eastern two-thirds of the country. Pollination is generally from mid-August until the end of September, with the predicted lower counts and longer seasons



in the southern part of the country. Ragweed is a very light pollen which may be windborne for hundreds of miles. An interesting study was made in New York City, in which 90% or more of the ragweed plants were destroyed in three of the five boroughs; pollen counts done during the season were virtually identical in all five.[4]

Ragweed is, of course, the most common cause of hay fever and is associated with an incredible loss of man hours from work each year. Many is the patient who travels to areas where the pollen count is low, just to avoid having symptoms. There is no ragweed anywhere in the world except the United States and portions of Canada and Mexico.

While molds are present through the year, the most important ones predominate from April until November. An old wives' tale has ragweed ending with the first frost, when actually it ends a good month earlier. It is Alternaria—the kingpin of the molds—that meets a sudden demise with the first frost. Alternaria-sensitive patients are in their glory when there is snow on the ground, and might be ideally suited to man the radar stations in Alaska. In September and October, Alternaria counts are at their highest, perhaps associated with the burning of leaves. Other molds such as Hormodendrum and Helminthosporium are associated with the warmer weather, as opposed to Penicillium and Aspergillus which are household molds.

Summer also means the return of our much maligned associates—bugs. Insects cause allergic symptoms by two methods: the bite or sting of the Hymenoptera group, and the inhalation of particles of the bodies of various insects. Wasp stings are the oldest known form of allergy, as they caused the death of one of the pharaohs in ancient Egypt.[5] Bees, wasps and hornets account for many deaths in this country, and those sensitive to them should carry special treatment kits at all times; a few minutes delay in the administration of epinephrine to such a patient, might be the difference between life and death. Inhalation of particles of insects may cause sneezing and wheezing in a susceptible individual.[6] Both of these forms of insect allergy may be benefitted by hyposensitization.

The insect recognizes no professional bounds. He is as apt to bite the physician as the patient. So this season, beware of bugs. And beware, too, of poison ivy. That pleasant stroll through the woods and underbrush with the Boy Scouts might turn into a

(Concluded on following page)

to relieve summer allergies
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nightmare for the botanically uninitiated in the causes of rhus dermatitis (poison ivy, poison oak and poison sumac). Although you may have been careful, your dog may not have noted that it wasn't clover he jumped through, but poison ivy. His return to your side may give you the rhus dermatitis that you so carefully avoided. That heavenly campfire may be emitting particles of rhus oil to produce an airborne contact dermatitis of the exposed areas of the body.

another fascinating, but rather infrequent type of summer allergy is physical allergy. Some people sneeze on exposure to sunlight, while others break out in rashes, usually on the exposed parts of the body. These rashes may well follow the administration of various photosensitizing drugs, e.g. demethylchlortetracycline.[7] Another form of physical allergy and one that may be lethal in the summer, is cold allergy. Yes, I mean cold allergy, not heat allergy. The cool dip on a hot day with its consequent sudden chilling of the body, may be the coup de grace for a cold sensitive patient.[8] It is customary to write "heart attack" on the death certificate, even though the victim may have been an 18-year-old boy who looks like a Greek god.

Lest the reader be depressed by this saga of afflictions associated with the warmer months, perhaps he should remember that it is also a time for swimming, baseball, lying in the sun and taking that long-planned vacation. So let's all join in a chorus of "In the Good Old Summertime," as we sneeze, wheeze and scratch. Be careful of your suntan lotion, however; it may cause you a contact dermatitis.

references 1. Unger, L.: Bronchial asthma. Charles C. Thomas Co. p. 47, 1946. 2. Samter, M.: Immunological diseases. Little, Brown and Co. p. 513, 1965. 3. Wodehouse, R. P.: Antigenic analysis by gel diffusions: 2. Grass pollen. Int. Arch. Allerg. **6**:65, 1955. 4. Cohart, E. M., and Kandle, R. P.: The Effects of a ragweed control program on ragweed pollen counts, J. Allergy **30**:287, 1959. 5. Woddell, L. S.: Egyptian civilization: Its origin and real chronology and Sumerian origin of Egyptian hieroglyphics. London: Luzak & Co. 1930. 6. Parlato, S. J.: The sandfly (Caddis fly) as an exciting cause of allergic coryza and asthma: II. Its relative frequency. J. Allergy **1**:307, 1930. 7. Ozere, R. L.: Demethylchlortetracycline photosensitivity. Canad. M. A. J. **85**:1199, 1961. 8. Horton, B. T., Braun, G. E., and Roth, G. M.: Hypersensitiveness to colds, JAMA **107**:1263, 1936.

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Precautions: The patient should be advised not to drive a car or operate dangerous machinery if drowsiness occurs. Use with caution in patients with hypertension, heart disease, diabetes or thyrotoxicosis.

(Advertisement)

in memoriam

VILLIAM P. BOPE, M.D.

William B. Bope, M.D., Decatur, one of Michi- in's oldest physicians, died March 26 at the age f 95.

His medical career began in 1897 after gradua- on from the Starling Loving Medical School in olumbus, Ohio, and ended with his retirement rly this year. He had practiced almost 70 years.

Doctor Bope had the distinction of being the rst president of the Van Buren County Medical ciety. He recently had been keenly interested in lping historians and students with medical his- ry research papers.

He was a staff member of Lake View Hospital Paw Paw, and during World Wars I and II he rved on the examining board in medicine.

VILBERT T. CLAXTON, M.D.

Wilbert T. Claxton, M.D., Britton, died March at the age of 70.

Doctor Claxton was a graduate of the University Michigan Medical School, Class of 1926, and e was affiliated with Herrick Memorial Hospital Tecumseh.

A member of the American Legion, Doctor Clax- n served five years in the United States Army.

In the past he served on the Ethics and Rural ealth Committees of the Lenawee County Medi- l Society.

HARLES P. DRURY, M.D.

Charles P. Drury, M.D., Marquette, who had racticed in the Upper Peninsula since 1917, died arch 24 in St. Petersburg, Florida. He was 78.

Doctor Drury received his medical degree at the niversity of Michigan in 1914. He went to Mar- uette in 1917 as city health officer, and moved to ron Mountain in 1924 where he entered private ractice. In 1936 Doctor Drury returned to Mar- uette where he served as health officer until 1953, fter which he was Upper Peninsula medical coor- inator for the Michigan Crippled Children Com- ission.

Doctor Drury was a member of Rotary Interna- ional and the Marquette City Health Council. He as a director of the Michigan Children's Aid So- iety, Upper Peninsula Branch.

FLOYD F. GIBBS, M.D.

Floyd F. Gibbs, M.D., Grand Rapids general practitioner for more than 25 years, died April 20 at the age of 71.

Born in the Ozark Mountains of Missouri, Doctor Gibbs served with a National Guard unit from that state during World War I and received a Purple Heart.

Graduated from St. Louis University Medical School, Doctor Gibbs interned in two St. Louis Hospitals and did postgraduate work at the University of Pennsylvania.

Doctor Gibbs was affiliated with St. Mary's Hospital.

JOHN L. GLEES, M.D.

John L. Glees, M.D., Grosse Pointe, Group Medical Director for the Chrysler Corporation, died March 2 at the age of 59. He had been associated with Chrysler Corporation for 11 years.

Born in Detroit, he was a 1931 graduate of the Detroit Medical School and was medical director with the Briggs Manufacturing Company from 1935 to 1956. He was affiliated with Detroit Memorial and Providence Hospitals.

Doctor Glees was a member of the Senior Men's Club of Grosse Pointe and the District Committee of the Boy Scouts of America. His medical fraternity was Phi Rho Sigma.

BERT A. GREINER, M.D.

Bert A. Greiner, M.D., Detroit, Past Chief of the Staff of St. Joseph Mercy Hospital, died March 21 at the age of 65.

Doctor Greiner was born in Port Huron and was a graduate of the Detroit College of Medicine. He practiced as an internist in Detroit for 40 years.

Doctor Greiner's medical fraternity was Phi Chi.

LUCIEN S. GRIFFITH, M.D.

Lucien S. Griffith, M.D., Grand Rapids physician since 1928, died March 17. He was 64.

A native of Dundee, Illinois, Doctor Griffith moved to Grand Rapids after graduation from Northwestern University Medical School in 1928. After two years of practice he studied at the University of Pennsylvania, where he earned a master's degree in obstetrics and gynecology.

He was a member of the Central Association of Obstetricians and Gynecologists, the West Michigan Society of Obstetricians and Gynecologists, and was a diplomat of the American Board of Obstetricians and Gynecologists.

Other memberships included the Sons of the American Revolution, Peninsular Club, University of Michigan Club, American Fertility Society, and Rotary International. Doctor Griffith's medical fraternity was Phi Rho Sigma.

LAURENCE W. HAYES, M.D.

Laurence W. Hayes, M.D., Howard City, a retired physician and surgeon who had practiced medicine in the area for more than 35 years, died April 1 at the age of 73.

A Grand Rapids native, Doctor Hayes was a graduate of Marquette University and the University of Michigan, where he received his medical degree in 1920.

Before entering private practice in Howard City, Doctor Hayes served on the staff of St. Mary's Hospital in Grand Rapids.

H. A. JARRE, M.D.

Hans Armin Jarre, M.D., Grosse Pointe Farms, Past President of the Detroit Roentgen Ray Society, died January 20.

Doctor Jarre, who received his formal medical education at Wuersburg, Kiel, Hall, Greipwald, was affiliated with Grace Hospital in Detroit.

Doctor Jarre was a fellow of the American College of Radiologists.

GEORGE O. KNUTSON, M.D.

George O. Knutson, M.D., Negaunee, former Negaunee and Marquette County Health Officer, died March 19 at the age of 52.

Born in Buxton, North Dakota, Doctor Knutson graduated from Northwestern University Medical School in 1937. Following his internship at Grace Hospital, Detroit, he moved to Negaunee where he was associated with the late R. A. Burke, M.D., in operating the Twin City Hospital. In 1957 he established the Palmer Nursing Home.

A veteran of World War II, in which he served as a flight surgeon in the United States Navy, Doctor Knutson was a member of Sigma Nu Fraternity, the Lions Club, and the Business and Professional Association.

A. F. LITZENBURGER, M.D.

Albert F. Litzenburger, M.D., Boyne City, Health Officer for the past 27 years for Emmet, Charlevoix, Antrim, and Otsego Counties, died March 26 at the age of 63.

A Past President of the Northern Michigan Medical Society, Doctor Litzenburger was a graduate of Wayne State University Medical School specializing in public health. Doctor Litzenburger also held a master's degree in public health from the University of Michigan.

He was a consultant to the Selective Service and was a member of the Chamber of Commerce and Nu Sigma Nu and Delta Omega medical fraternities.

WSU Begins New Series Of PG Courses

Many third-quarter continuing education courses began at Wayne State University Medical School in March and April.

These were in biochemistry, medicine, occupational and environmental health, psychiatry, radiology, dermatology, physiology, and pharmacology. In some other fields courses continue the year around.

CHOSEN AMONG DETROIT'S TEN TOP WOMEN

A woman physician is among this year's Ten Top Working Women. She is Alice E. Palmer M.D., Detroit, in private life, Mrs. Lawrence Pratt The women were named by the Central Business District Association in Detroit.

A practicing dermatologist, Doctor Palmer is medical consultant for the Far East Health Branch of the State Department's Agency for International Development (AID). She also serves as associate editor of the *Detroit Medical News* and is president of the Detroit Dermatological Society.

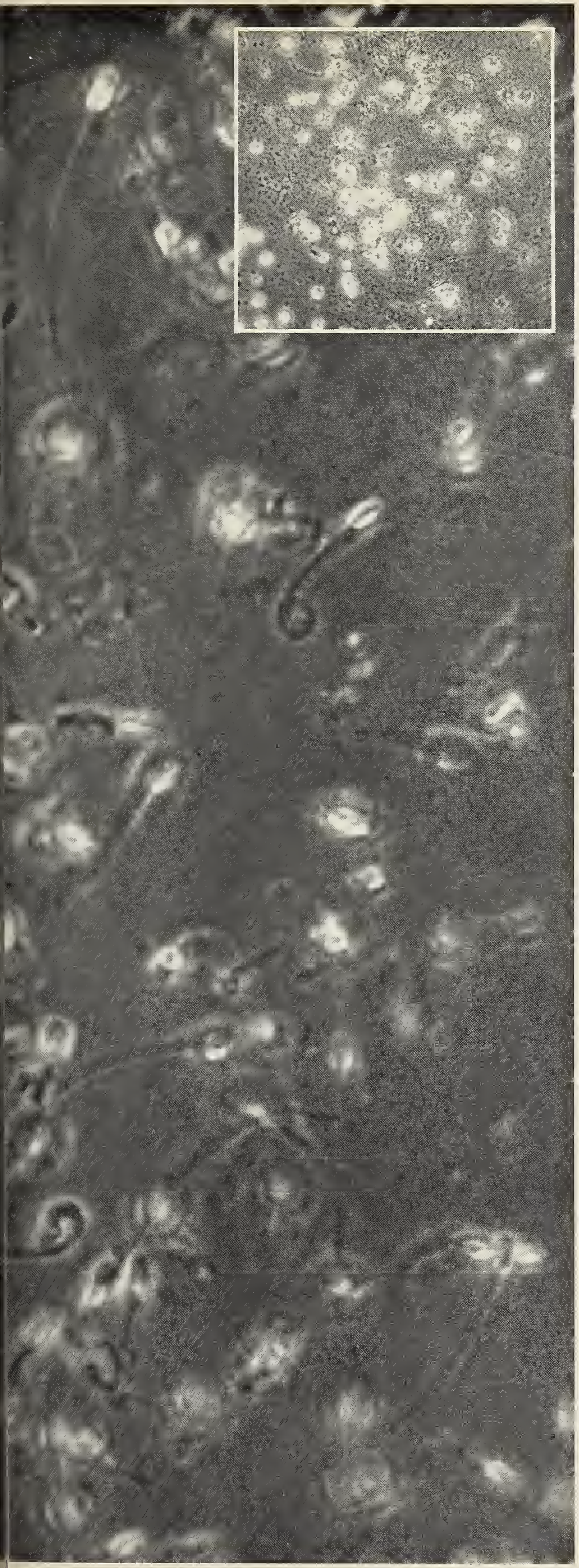
Formerly, as chief of the AID project for the Development of Medical Education, Doctor Palmer spent two years teaching and practicing medicine in Saigon, South Vietnam.

The Ten Top Working Women received a special salute during the Annual Week for Women Who Work.

MRS. BASSETT SUCCEEDS MRS. MAYER IN WASHTENAW

Mrs. Adelle Bassett is now executive secretary of the Washtenaw County Medical Society. Mrs. Bassett's appointment followed the resignation of Mrs Flora Mayer, who had served as executive secretary for 19 years.

As a tribute to Mrs. Mayer, the Executive Council of the Washtenaw Society voted her honorary membership in the Society.



New view of an oral contraceptive at work

Although suppression of ovulation remains the primary mode of action of oral contraceptives, newer knowledge indicates that products like Norinyl-1—which provide the combined action of both low-dosage progestogen and estrogen for the full treatment cycle—offer multiple contraceptive action that helps explain their unexcelled record of effectiveness. This report explores the secondary protective mechanisms against unwanted pregnancy offered by combined hormonal administration and the importance of the progestational agent in making such multiple contraceptive action possible.

Accumulating evidence has indicated that sparse, highly viscous cervical mucus has an adverse effect on the motility and survival of spermatozoa.

The estrogen-opposing progestational ingredient of Norinyl-1 (norethindrone 1 mg. with mestranol 0.05 mg.) reverses the usual midcycle picture of a thin, watery cervical mucus. The result—a built-in barrier that inhibits sperm from reaching the ovum should one be released. The inset in the adjoining photograph shows immobile spermatozoa as they appear in cervical mucus taken from a patient treated with Norinyl-1.

See last page for contraindications, precautions, side effects and dosage.

How the estrogen-opposing action of Norinyl-1 creates a hostile cervical mucus

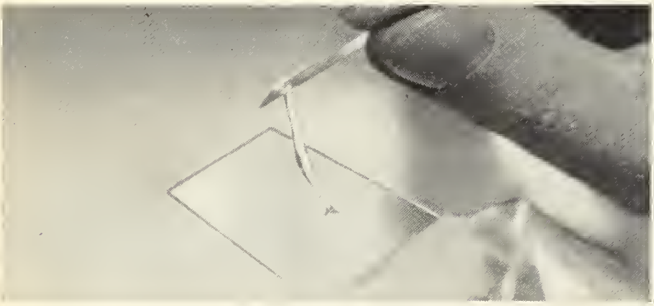
Normally estrogen activity during the fertile midcycle stimulates the production of cervical mucus. The mucus at this time is profuse and watery—allowing maximum sperm motility and promoting penetration.
But what happens when Norinyl-1 is administered? Its potent progestogen, norethindrone, opposes estrogen stimulation of cervical mucus. Consequently, the amount of mucus decreases and its viscosity increases. This results in a sparse but thick mucus barrier that diminishes the vitality of the sperm and impairs its powers of penetration.

How hostile cervical mucus supports contraceptive action

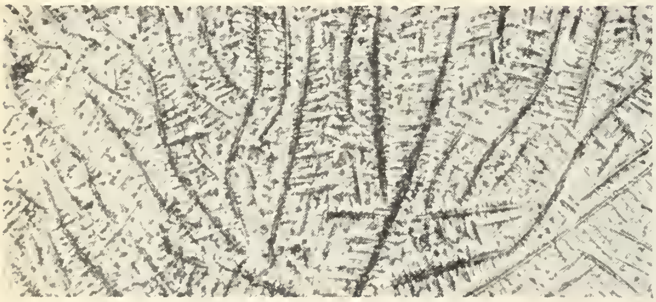
The importance of these observations to the effectiveness of Norinyl-1 has been noted in a report on 89 patients taking this medication.* In all instances, cervical mucus obtained from cycle day 5 to cycle day 29 appeared scant and thick and exhibited little or no Spinnbarkeit. In the opinion of this investigator, the effect on cervical mucus may be sufficient to prevent conception.

*Symposium on Low-Dosage Oral Contraception, Palo Alto, Calif., July 15, 1965.

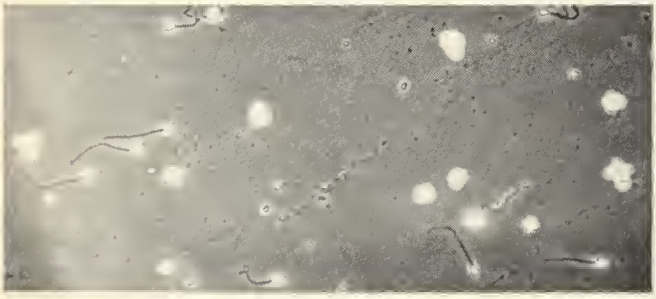
Normal cervical mucus at midcycle in untreated patient permits sperm motility... promotes sperm penetration.



Cervical mucus is thin and watery with a stretchability (Spinnbarkeit) of 15 to 20 cm.

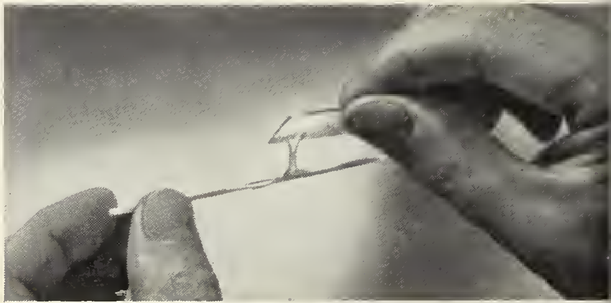


Thin, watery mucus crystallizes into this well-defined, fernlike pattern within a minute.

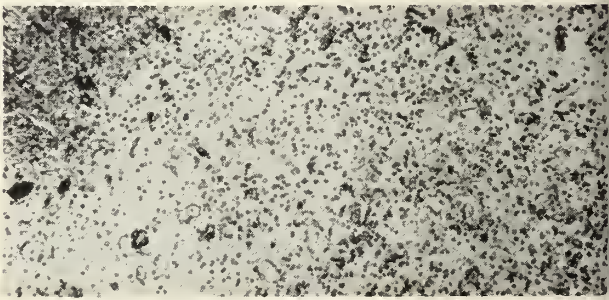


Spermatozoa appear healthy, are active and free moving.

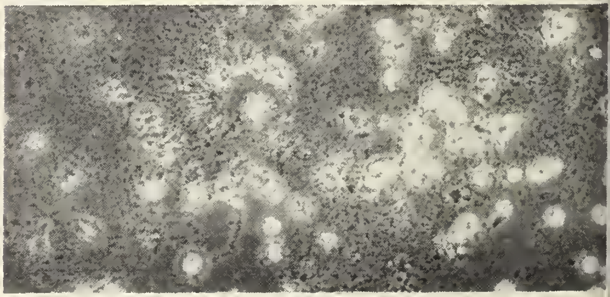
Hostile cervical mucus at midcycle produced by Norinyl-1 impairs sperm vitality... inhibits penetration.



Cervical mucus is scanty, thick and viscous. Spinnbarkeit is 1 cm. or less.



In thick, hostile cervical mucus the fern pattern is poorly defined or absent.

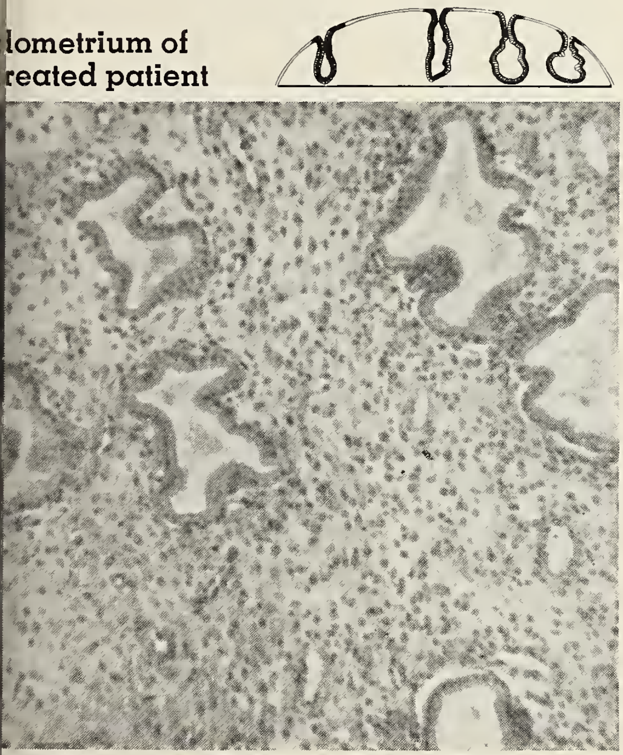


Immobile spermatozoa as they appear in cervical mucus taken from a patient treated with Norinyl-1.

n endometrium nreceptive to nidation– nother supporting ontraceptive ction of Norinyl-1

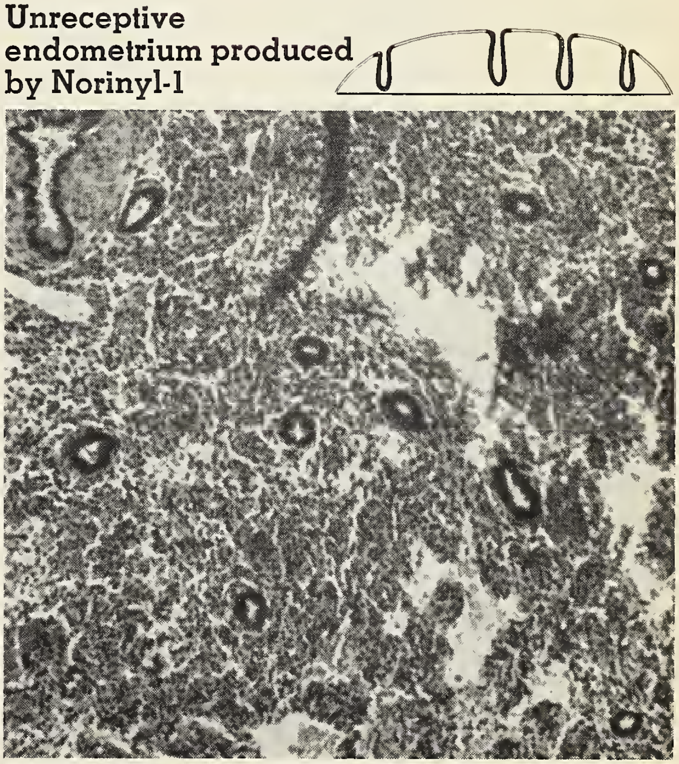
ıs suppose that an ovum is released—as occurs in an
sional, rare case—and somehow a sperm succeeds in
etrating the cervical mucus barrier? Should this come about,
additional action of Norinyl-1 may protect the patient from
anted pregnancy—progestogen intake makes endometrial
ıe unreceptive to implantation.

lometrium of
reated patient



mally the endometrium progresses through
oliferative phase stimulated by estrogen and a
etory phase stimulated by progesterone.
ing the secretory phase the endometrium is
ptive to the fertilized ovum.

Unreceptive
endometrium produced
by Norinyl-1



When Norinyl-1 is administered its progestogen component—norethindrone—accelerates the secretory phase, suppressing glandular development. From day 11 on, secretory action is no longer present. The result is that during the latter half of the cycle the endometrium becomes unreceptive to egg implantation.

new Norinyl®-1 tablets

(norethindrone 1mg c̄ mestranol 0.05mg.)

last page for contraindications, precautions, side effects and dosage.

for multiple contraceptive action

effective fertility control on half the previous dosage

maintains ratio of the established norethindrone/mestranol combination

lower cost

new Norinyl®-1 tablets

(norethindrone 1mg. $\bar{c}$ mestranol 0.05mg.)

Reduction of oral contraceptive dosage to lowest effective levels h
become a well-accepted principle of conservative medical pract
In keeping with this view, Norinyl is now available in a new stren
in which *both* norethindrone and mestranol are reduced 50 perc
Studies show that Norinyl-1 achieves fertility control with only 1
mg. of combined progestogen and estrogen per tablet.

Norethindrone was first reported for use as a progestational agent
human beings in 1955. Norethindrone 2 mg. with mestranol 0.1 mg.,
an oral contraceptive, is currently in use by over 2,000,000 wom
Clinical experience now establishes that Norinyl-1 also amply me
the criteria of reliability and safety.*

*Symposium on Low-Dosage Oral Contraception, Palo Alto, Calif., July 15, 1965.

PRESCRIBING INFORMATION

Contraindications: 1. Patients with thrombophlebitis or with a history of thrombophlebitis or pulmonary embolism. 2. Liver dysfunction or disease. 3. Patients with known or suspected carcinoma of the breast or genital organs. 4. Undiagnosed vaginal bleeding.

Warnings: 1. Discontinue medication pending examination if there is sudden partial or complete loss of vision or if there is a sudden onset of proptosis, diplopia, or migraine. If examination reveals papilledema or retinal vascular lesions, medication should be withdrawn. 2. Since the safety of Norinyl-1 in pregnancy has not been demonstrated, it is recommended that for any patient who has missed two consecutive periods, pregnancy should be ruled out before continuing the contraceptive regimen. If the patient has not adhered to the prescribed schedule, the possibility of pregnancy should be considered at the time of the first missed period. 3. Detectable amounts of the active ingredients in oral contraceptives have been identified in the milk of mothers receiving these drugs. The significance of this dose to the infant has not been determined.

Precautions: 1. The pretreatment physical examination should include special reference to breast and pelvic organs, as well as a Papanicolaou smear. 2. Endocrine and possibly liver function tests may be affected by treatment with Norinyl-1. Therefore, if such tests are abnormal in a patient taking Norinyl-1, it is recommended that they be repeated after the drug has been withdrawn for 2 months. 3. Under the influence of estrogen-progestogen preparations, preexisting uterine fibroids may increase in size. 4. Because these agents may cause some degree of fluid retention, conditions that may be influenced by this factor, such as epilepsy, migraine, asthma, cardiac, or renal dysfunction, require careful observation. 5. Although a cause and effect relationship has not been established, Norinyl-1 should be used with caution in patients with a history of cerebrovascular accident. 6. In relation to breakthrough bleeding, as in all cases of irregular bleeding *per vaginam*, nonfunctional causes should be borne in mind. In cases of undiagnosed vaginal bleeding, adequate diagnostic measures are indicated. 7. Patients with a history of psychic depression should be carefully observed and the drug discontinued if the depression recurs to a serious degree. 8. Any possible influence of prolonged Norinyl-1 therapy on pituitary, ovarian, adrenal, hepatic or uterine function awaits further study. 9. A decrease in glucose tolerance has been observed in a small percentage of patients on oral contraceptives. The mechanism of this decrease is obscure. For this reason, diabetic patients should be carefully observed while receiving Norinyl-1 therapy. 10. Because of the occasional occurrence of thrombophlebitis and pulmonary embolism in patients taking oral contraceptives, the physician should be alert to the earliest manifestations of the disease. A cause and effect relationship has not been demonstrated. 11. Because of the effects of estrogens on epiphyseal closure, Norinyl-1 should be used judiciously in young patients in whom bone growth is not complete. 12. The age of the patient constitutes no absolute limiting factor, although treatment with Norinyl-1 may mask the onset of the climacteric. 13. The pathologist should be advised of Norinyl-1 therapy when relevant specimens are submitted.

Side Effects: The following adverse reactions have been observed with varying incidence in patients receiving oral contraceptives: nausea, vomiting, gastrointestinal symptoms, breakthrough bleeding, spotting, change in menstrual flow, amenorrhea, edema, chloasma, breast changes (tenderness, enlargement and secretion), loss of scalp hair, change in weight (increase or decrease), changes in cervical erosion and cervical secretions, suppression of lactation when given immediately postpartum, cholestatic jaundice, erythema multiforme, erythema nodosum, hemorrhagic eruption, migraine, rash (allergic), itching, rise in blood pressure in susceptible individuals, mental depression.

The following occurrences have been observed in users of oral contraceptives. A cause and effect relationship has not been established: thrombophlebitis, pulmonary embolism, neuroocular lesions.

The following laboratory results may be altered by the use of oral contraceptives
creased bromsulphalein retention and o
hepatic function tests, coagulation tests
crease in prothrombin, factors VII, VIII, IX
X), thyroid function (increase in PBI and l
nol extractable protein-bound iodine and
crease in T^3 values), metapyrone test, pregr
diol determination.

Other side effects reported to have occu
in association with use of this drug are
ness, hirsutism, pains in legs, back, chest
abdomen, dysuria, drowsiness, vaginal
charge, libido increased and decreased,
tions, hypermenorrhea, hypomenorr
increased appetite, G.U. infections, vari
veins, abdominal fullness, acne, headc
nervousness, allergies, blurred vision, pai
eyes, and itching in eyes. *For complete clin
data,* see *package insert.*

Dosage and Administration: 1. One table
Norinyl-1 is administered orally for 20
beginning on day 5 of the menstrual c
(Count day 1 of the cycle as the first da
menstrual bleeding.) Repeat this dosage sc
ule for each cycle. 2. If no menstrual pe
occurs after a cycle of treatment (20 tablet
which patient adhered to the schedule, the
tient must be instructed to resume taking
Norinyl-1 tablets 7 days after the previou
day course was completed. For example, if
last pill of a previous cycle had been take
a Sunday, then a new cycle of treatment sh
begin on the following Sunday. 3. In the
partum woman, it is recommended that
first cycle of treatment should begin on d
of the first menstrual cycle. However, Nori
should not be administered during lactation

Availability: Norinyl-1 (norethindrone 1
with mestranol 0.05 mg.)—Dispensers of 20
60 and bottles of 250 tablets.

norethindrone — an original steroid from
SYNTEX
LABORATORIES INC., PALO ALTO, CALIF.

In Michigan . . .
These Syntex men serve the physician

Gerard DeBusschere
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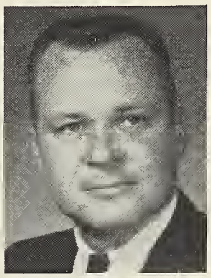
Thomas Doyle
Detroit, Michigan
533-9506

George Glatter
Detroit, Michigan
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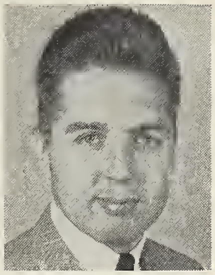
Jerry C. Johnson
Elkhart, Indiana
264-0362


David Jones
Toledo, Ohio
475-2501

Joseph Monticciolo
Saginaw, Michigan
754-8939

Everett T. Murray
Royal Oak, Michigan
548-4881

Raymond Zagar
Milwaukee, Wisconsin
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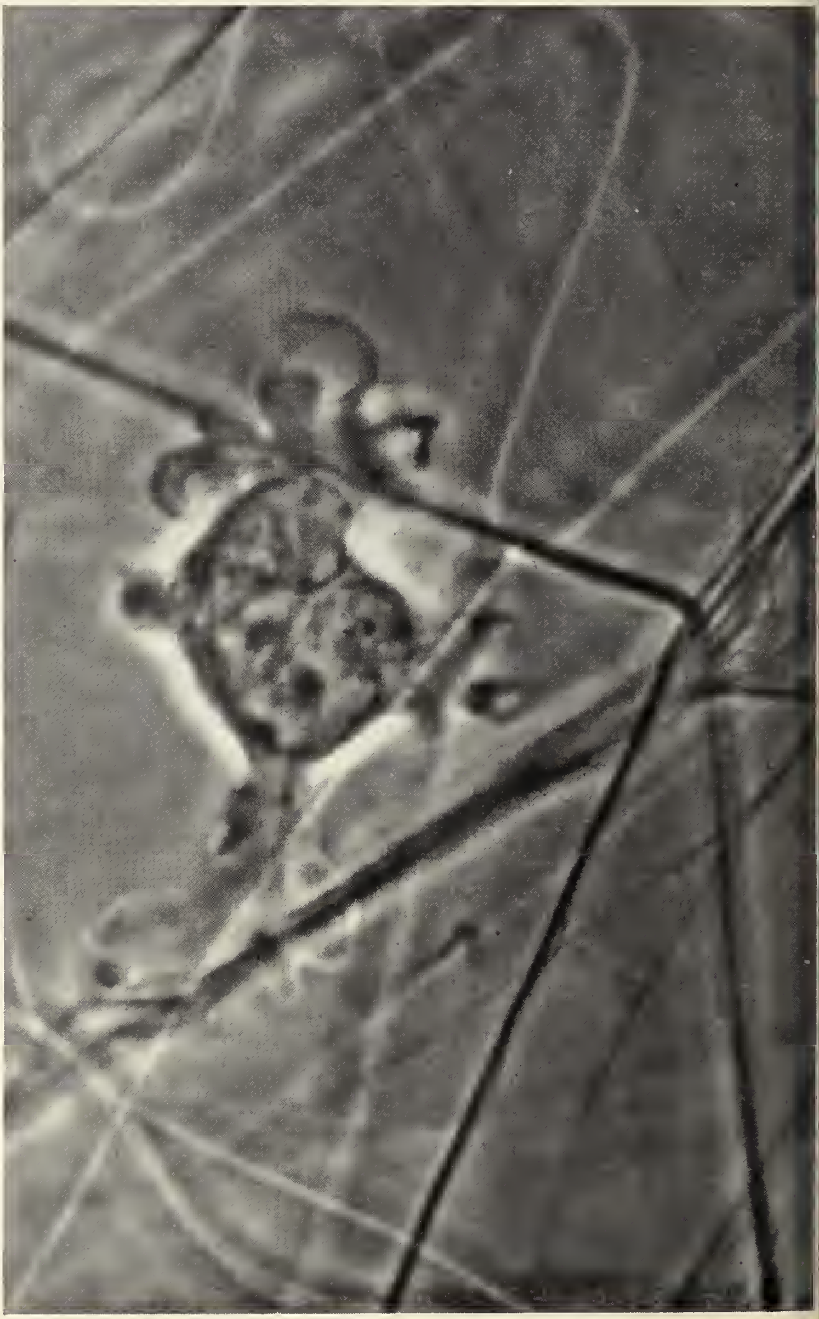
LABORATORIES INC., PALO ALTO, CALIF.

INFLAMMATION:
A cellular fight for life

A SYNTEX REPORT based on recently developed hypotheses about topical corticosteroids, including the cellular theories of inflammation by Thomas F. Dougherty, Ph.D., University of Utah.

You are looking at a fibroblast fighting for life. This cell – one of the most common found in connective tissue – has literally been poisoned by cytotoxins released from other cells that have ruptured. Soon, if the abnormal activity of this fibroblast does not cease, it, too, will rupture and die – one more casualty in the inflammatory wave of destruction precipitated by injury.

Until a short time ago no one had ever witnessed such a scene at the cellular level. Now, through advanced cinemicrographic techniques, it is possible to view and photograph the inflammatory process as produced experimentally in living animal tissue. This method permits new insight into the mechanism of inflammation and the role of corticosteroids in therapeutic management. Equally important, these techniques shed new light on factors that may make one corticosteroid more effective than another – factors that can be correlated with other chemical, biologic, and clinical parameters.

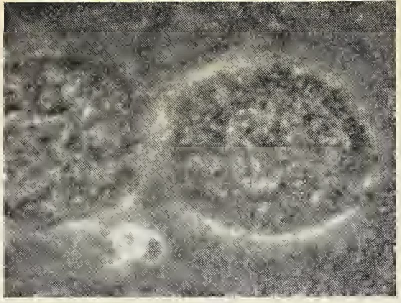


isual evidence of how rticosteroids influence inflammatory reaction

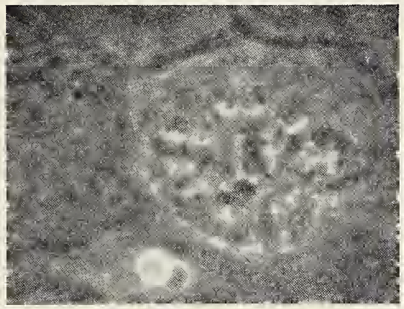
king with phase-contrast cine- rography on living animal tissue, tors Thomas F Dougherty and id Berliner of the University of h College of Medicine have actu- filmed cellular events that occur ng the inflammatory reaction. s remarkable study* and addi- al work by these investigators, as as by others, have established a theoretical biologic basis for the inflammatory effect of the corti- eroids. (It must be noted that r theories, such as the lysosome so-called "suicide bag" theory, been postulated, although it is e likely that there are more larities than differences among various theoretical models.)

he inflammatory wave of destruction

his investigation an injurious in- ion of gelatin is used to set off an ammatory reaction in living se tissue. What follows is a wave estructive cellular activity that prises the inflammatory re- nse to injury. Mast cells (which tain heparin, serotonin and hista- e) take up water, swell and rup- , releasing their contents, which toxic outside the mast cell wall. se toxins, in turn, cause disinte- ion of other cells (such as fibro- ts) and the release of additional c material. Capillaries, too, take water and leak unformed blood ents, causing edema. And poly- phonuclears, lymphocytes and thelial cells invade the inflamed As a result of all these changes, cellular environment reaches a e of turmoil.



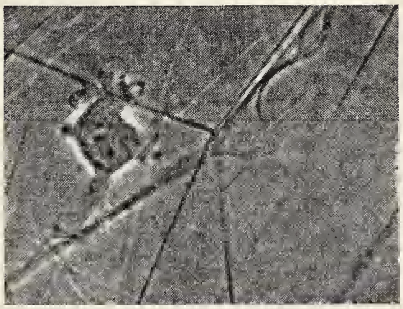
Phase-contrast microscopy showing mast cell before injury.



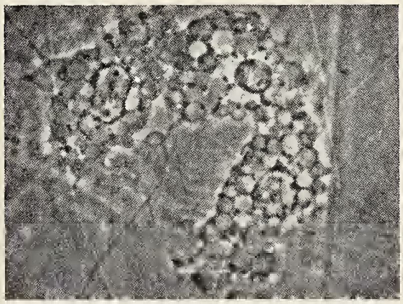
Mast cell (after injury) has broken up and released cytotoxins.

How corticosteroids change the picture

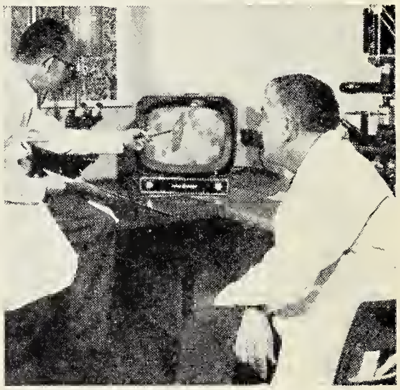
Corticosteroids appear to virtually stop the abnormal cellular activity that constitutes the inflammatory reaction. This permits the body's natural resources to clear up the inflamed area and repair the damaged tissue. This interpretation is supported by the fact that when the injurious gelatin solution is injected simultaneously with a corticosteroid – Synalar (fluocinolone acetonide) – the inflammatory pattern simply does not develop.



Fibroblast in high state of activity, much distorted.



Mast cells showing effects of corticosteroid action: cells are normal in size, shape and activity.



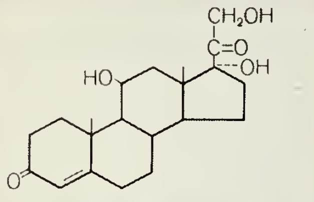
In summarizing his study Doctor Dougherty states: "...we also feel this work may explain why one corticosteroid helps a patient more rapidly and effectively than another. If it does, it is because one corticosteroid is the fastest, most effective inhibitor of the series of inflammatory events at the tissue level."

A New View of Corticosteroid Action in Inflammatory Dermatoses, a film based on this study, is now available from your Syntex representative.

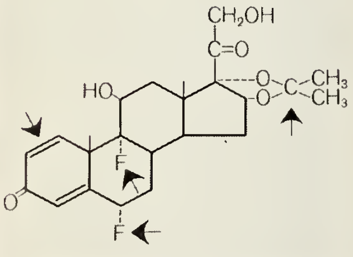
See last page for contraindications, precautions, side effects and dosage.

How advances in chemical design have achieved greater steroid potency

The chemical modification of corticosteroid molecules from the advent of hydrocortisone to the development of Synalar (fluocinolone acetonide) is a prime example of how biochemists can "design" to increase therapeutic activity and minimize undesirable side actions. Below, for example, we see the important changes that were made in reference to the hydrocortisone molecule to produce fluocinolone acetonide, one of the most active of all topical corticosteroids. As a result, a 0.01% preparation of Synalar (fluocinolone acetonide) has been reported to do the work of a 1% hydrocortisone product containing 100 times more cortiscosteroid. And it can often do it more effectively.



Hydrocortisone

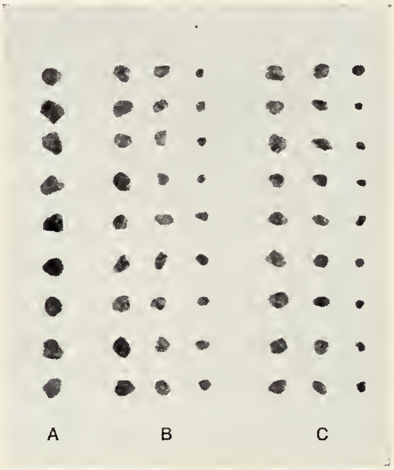


Fluocinolone Acetonide (Synalar)

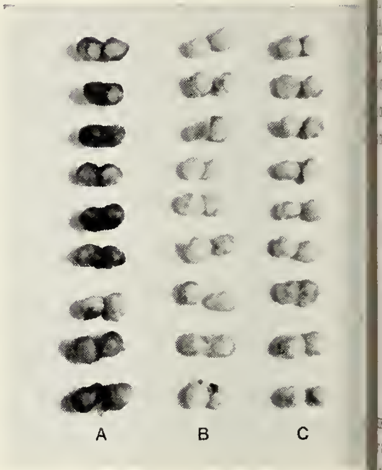
- ☐ *a double bond between carbons 1 and 2*
- ☐ *fluorine substitutions at* both *the 6-α, and the 9-α positions*
- ☐ *the addition of the acetonide at the 16-α, 17-α positions, thus providing one of the most potent topical corticosteroids available.*

How bioassay tests are used to "predict" therapeutic potential

Biologic assays are another tool used by researchers to help establish the relative activity of corticosteroids. To date no single method of assaying corticosteroid activity has emerged as the ideal "yardstick" for predicting therapeutic potential. Taken together, however, these methods have proved useful. When such tests are run on various corticosteroids, a definite order of corticosteroid activity becomes evident. Compounds with the highest order of activity may be expected to merit clinical trial to establish their high therapeutic potential. When assayed by these methods, fluocinolone acetonide (Synalar) emerges as one of the most active topical corticosteroids, milligram for milligram, available for clinical application today.



THE THYMUS INVOLUTION ASSAY[1-4] is run on adrenalectomized rats. The sizes of the glands are measured, and the degree of involution caused by the steroid is determined as an indication of its potency. In the above photo, the comparative involution of thymus glands achieved with hydrocortisone and Synalar (fluocinolone acetonide) is shown. Untreated controls (A) show normal size. Group B – injected with 1, 2 and 4 mg. of hydrocortisone – show progressively smaller thymuses as does Group C – injected with fluocinolone acetonide – but with only 1/500th the dose of hydrocortisone.



THE ANTIGRANULOMA ASSAY[1-4] al
utilizes adrenalectomized rats. Gr
ulomas are induced by subcutaneo
implantation of cotton pellets
either side of the thorax. The degr
of granuloma inhibition achieved
a steroid reflects its potency. T
above photo shows the inhibition
granuloma formation achiev
with hydrocortisone and Synal
(fluocinolone acetonide). Untreat
controls (A) show large, red gra
lomas adhering to the pellets. Gro
B, receiving hydrocortisone a
Group C, receiving fluocinolone a
tonide, show little, if any, granulor
formation. Fluocinolone acetoni
produced the same effect as hyd
cortisone with only 1/500th the do
This assay, as well as the thym
involution assay, measures systen
rather than topical corticosteroid
tivity. Nevertheless, results by th
methods correlate well with other
says and with the milligram pot
cies of topical steroids in curre
clinical use.

Worldwide clinical experience confirms the predictable therapeutic potential of Synalar

is particularly gratifying that the
mise of the advanced chemical
ign and high order of bioassay ac-
ity of Synalar (fluocinolone ace-
ide) has been confirmed by
lespread therapeutic application.
leed, the impressive clinical re-
nse rate of Synalar has been docu-
nted in no fewer than 232 papers
m 22 countries.

Representative Clinical Results with Synalar*

Efficacy Documented in over 4,000 Patients

Condition	Number of Publications	Number of Patients	Significant Improvement†
Contact Dermatitis	27	750	713
Eczematous Dermatitis	21	472	409
Seborrheic Dermatitis	18	442	426
Atopic Dermatitis	24	460	426
Psoriasis	36	1,699	1,510
Neurodermatitis	18	351	324
Total	144	4,174	3,808

*Complete bibliography on request.

†Expressed by the authors as excellent, very good, good, complete remission of inflammation, etc.

ESCRIBING INFORMATION
initiation of therapy: Cream 0.025%,
nd 15 Gm. tubes, 425 Gm. jars; *for*
ollient effect: Ointment 0.025%, 15
. tubes; *for maintenance therapy:*
am 0.01%, 15 and 45 Gm. tubes, 120
. jars; *for intertriginous or hairy*
s: Solution 0.01%, 20 cc. and 60 cc.
stic squeeze bottles; *for infected in-*
nmatory dermatoses: Neo-Synalar®
am (0.025% fluocinolone acetonide,
mycin sulfate, equivalent to 0.35%
mycin base), 5 and 15 Gm. tubes.
NTRAINDICATIONS: Tuberculous, fungal,
most viral lesions of the skin, (in-
ding herpes simplex, vaccinia, and
icella). Not for ophthalmic use. Con-
ndicated in individuals with a his-
of hypersensitivity to any of the
ponents. PRECAUTIONS: Synalar prep-
tions are virtually nonsensitizing and
irritating. However, the solution may
duce burning or stinging when ap-
d to denuded or fissured areas. In
e patients with dry lesions, the solu-
may increase dryness, scaling or
ing. While topical steroids have not
n reported to have an adverse effect
pregnancy, the safety of their use on
gnant females has not absolutely
n established. Therefore, they should
be used extensively on pregnant pa-
nts, in large amounts, or for prolonged periods of time. Prolonged use of any antibiotic may result in overgrowth of nonsusceptible organisms; if this occurs, appropriate therapy should be instituted. When severe local infection or systemic infection exists, the use of systemic antibiotics should be considered, based on susceptibility testing. SIDE EFFECTS: Side effects are not ordinarily encountered with topically applied corticosteroids. As with all drugs, however, a few patients may react unfavorably to Synalar under certain conditions. The neomycin in Neo-Synalar Cream rarely produces allergic reactions.

REFERENCES: 1. Lerner, L. J., Bianchi, A., Turkheimer, A. R., Singer, F. M., and Borman, A.: Anti-inflammatory steroids: potency, duration and modification of activities. Ann NY Acad Sci 116:1071 (Aug. 27) 1964. 2. Idem: Comparison of anti-granuloma, thymolytic and glucocorticoid activities of anti-inflammatory steroids. Proc Soc Exp Biol Med 116:385 (June) 1964. 3. Ringler, A.: Activities of adrenocorticosteroids in experimental animals and man, in Dorfman, R. I.: Methods of hormone research, New York, Academic Press, 1964. vol. III. pp. 234-280. 4. Gubersky, V. R.: To be published.

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1967 Annual Scientific Session of the MSMS

A New Look and Program Format

For the first time, all scientific meetings and exhibits will be on o floor of the Civic Auditorium.

Three concurrent scientific meetings will be held in assemblies adj cent to the exhibit area.

Luncheons each day will feature informal discussion during t meal with guest lecturers seated at various tables throughout t room.

MSMS Sections will present scientific programs of interest to doct registrants and all scientific meetings will be open to all. Some the Sections plan receptions and dinner meetings in addition to t scientific program presentation.

The Annual Dinner Dance will be held on Wednesday evenin September 27. An evening session on Thursday, September 28, w be open to the public — discussing Family Life Education.

The Scientific Program Committee has planned a program of bro scope with practical applications in the physician's home practi

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MAP Award Given To Wiley; Re-Elect Saltonstall to Board

The Eighth Congress of the Michigan Association of the Professions passed three resolutions dealing with health programs — one each about governmental medical care programs, a professional manpower recruitment study, and the four-year medical school at Michigan State University — as part of the April 28-29 annual meeting in Detroit.

Among the awards MAP presented was one to D. Bruce Wiley, M.D., Lansing. Doctor Wiley was given an ornamental scroll in recognition of his service to the MAP Board of Directors.

Reelected to the Board of Directors was Gilbert B. Saltonstall, one of MAP's founding directors. Doctor Saltonstall will begin his fifth two-year term as director.

Coaches, Doctors Confer May 25, U-M

Michigan high school coaches and trainers are invited to confer with team physicians, May 25 at the University of Michigan at a conference aimed at guarding and improving the health of the high school athlete.

The Conference on the Medical Aspects of High School Sports, a joint project of the Michigan State Medical Society and the University of Michigan Department of Postgraduate Medicine, will be held at the University of Michigan Medical Center from 9:30 to 4:30.

There will be no registration fee, and the lunch will be dutch-treat.

Medical Leaders To Confer May 24; Subject: Change

"The Challenge of Creative Change" is the subject of the May 24 MSMS Conference for Medical Society Leaders in Detroit at the Wayne County Medical Society building.

A special invitation to attend the meeting was extended to delegates and alternates to the MSMS House of Delegates, members of The Council, and officers of component medical societies.

Included in the program will be discussion of "Developing Patterns in State and Federal Legislation," the "Responsibilities and Methods of Utilization Review," "Medicare and Medicaid," and "Professional Liability Insurance."

Health Careers Mobile At Tulip Festival

The Health Careers Mobile continues to leave a trail of information and inspiration about health careers as it journeys throughout the state.

Holland is to host the Careers Mobile during the week of May 15 and the Tulip Festival.

The Health Careers Mobile will roll on to Hastings the next week, and then to Berrien Springs for the week of May 29. In Berrien Springs the unit will be a part of a special Boy Scout meeting and of Michigan Week. The celebration of Michigan Week in Berrien Springs will focus on health careers.

"Paradoxes in Modern Medicine" were discussed by the Rev. Paul B. McCleave, LL.D., center, AMA Director of Medicine and Religion, May 9 at MSU. Talking with the Yates Lecturer are T. C. Blair, M.D., Member of the Ingham County Medical Society Medicine and Religion Committee, and W. H. Meade, M.D., right, member of the reactor panel. The Michigan Tuberculosis and Respiratory Disease Association sponsored the evening lecture, with MSMS and other cosponsors.

Rice, Others Speak At UP Programs

Michigan physicians played a major role at the Second Annual Upper Michigan Health Congress, May 11, and the Health Careers Congress, May 12, at Northern Michigan University in Marquette.

Robert Rice, M.D., Greenville, and Chairman of the MSMS Committee on Rural Health, gave the keynote address for the Health Careers Congress. Doctor Rice's topic was "Wanted: People Who Want to Help People."

Delivering the keynote address at the Health Congress was Vlado Getting, M.D., Dr.P.H., Ann Arbor. Doctor Getting's subject was "Comprehensive Health Planning."

Later in the program Gordon Eadie, M.D., M.P.H., Newberry, introduced the afternoon speaker, Carruth Wagner, M.D., M.P.H., Assistant Surgeon General of the United States Public Health Service.

Carl Moyer, M.D., Baraga, summarized the conclusions of the afternoon workshops.

The events, sponsored by the Michigan Health Council and other groups, sought to plan and extend health programs into all areas of Upper Michigan and to encourage interest in the many health careers now available.

PSYCHOTHERAPY LIMITED

Routine payment for outpatient psychotherapy under the current Civilian Health and Medical Programs of the Uniformed Services (CHAMPUS) is being limited now to two treatments per week.

New regulations placing these limitations provide, however, for exceptions.

Physicians may obtain answers to specific questions by writing MSMS, 120 West Saginaw, East Lansing 48823.

MDPAC Conducting Membership Drive

Membership recruitment is the No. 1 goal this year of Michigan Doctors Political Action Committee.

The recent annual report of AMPAC shows that Michigan has 591 physicians who are joint members of MDPAC-AMPAC.

Michigan ranks 16th in total contributions, according to the AMPAC report.

V. V. Bass, M.D., Saginaw, MDPAC President, urges every physician to seriously consider the importance of becoming an active member of this political action organization.

COMMITTEE ON TRAUMA HELPS U-M CONFERENCE

The Ann Arbor Committee Trauma of the American Colle of Surgeons and the U of M Me ical Center, Highway Safety R search Institute, cooperated sponsor the Second Annual U versity of Michigan Conference the Initial Management of t Acutely Ill or Injured Patie May 1-3.

Speakers proposed ways to i prove current methods of cari for accident victims. About 2 persons — all of them activ working in care for accident v tims — attended the conference.

WSU Alumni Honor Whittaker, Romney; Citation to France

The Wayne State Univers Medical School Alumni Assoc tion, as pa of its 1967 union May has announ the followi special honor

Alfred Whittake M.D., Detr has bee granted hon ary membership in the Wa State University Medical Alu Association. A member of WSU Board of Governors, Doc Whittaker has long been invol with the growth of WSU. Also p sented an honorary membership the Medical Alumni Associati is Michigan's Governor Romn A Distinguished Service Citati was awarded to C. Jackson Fran M.D., in recognition of his o standing contributions to the m ical profession. His photo was ried in the May issue of *Michi Medicine,* page 625.

Speeches, movies, newspaper stories, radio and TV programs,
c., are all carrying forward the current MSMS Family Life Educa-
n thrust. Among those on the steering committee are: E. C. Gal-
erer, M.D., Saginaw; Alice C. Beckwith, Advisor from the Michigan
partment of Public Health; Jose' J. Llinas, M.D., Lansing; and
ancis A. Locke, M.D., Adrian.

ean Cites Need or More Funds

Every medical center in the na-
on is in trouble financially, Dr.
illiam N. Hubbard, Jr., M.D.,
ean of the University of Michi-
n Medical School, testified be-
re the House Appropriations
ommittee in Washington.

Dean Hubbard, President of the
merican Association of Medical
olleges, recommended large in-
eases in federal aid to medical
hools.

He asked for an increase of $10
illion in the budget for health
lucation facilities, doubling of
e budget for health research fa-
lities construction in 1968 to at
ast $100 million, and $20 million
r construction of facilities for
re of research animals.

"State and private agencies cannot provide the funds required by all the programs of the academic medical centers," Dean Hubbard told the Committee, April 27. "Unless adequate sources of federal funds continue, we cannot continue to fulfill the medical obligations that we have to the people, that they have every right to expect from us."

LANSING — The Greater Michigan Foundation recently named Harold M. Frost, M.D., Detroit, as a recipient of a "Wolverine Frontiersman Award." Doctor Frost, Henry Ford Hospital Orthopedic Surgeon, was cited "for his distinguished research on orthopedic surgery."

The Alumni Association of Wayne State University has presented a Faculty Service Award for outstanding contributions to the University and the community to John M. Dorsey, M.D., Highland Park.

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The following materials may be useful to you. Check any item de-
red, cut out the form, and mail it in an envelope to: Michigan State
edical Society, 120 West Saginaw, East Lansing, Michigan 48823.

____ **Youth Looks at Cancer, 66-page booklet for use in high schools, published by the American Cancer Society.**

____ **JAMA Selected Questions and Answers, 416-page pocketbook; limited supply.**

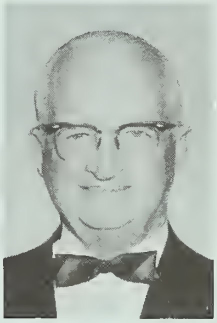
____ **Order sheet for AMA Health Information Materials with short descriptions of all available booklets, folders, etc.**

(Your address already is on the back of this coupon.)

Swanson Honored; Board to Elect Secretary Soon

The State Board of Registration in Medicine is expected to select its new executive secretary at its next meeting in July.

Since the retirement in April of E. C. Swanson, M.D., B. M. Harris, M.D., of Ypsilanti, has been serving as acting executive secretary of the Board. Doctor Harris is a member of the State Board of Registration.



Upon his retirement as executive secretary, a post he held for 16 years, Doctor Swanson was honored by the Michigan Legislature. Doctor Swanson was cited for 35 years of professional, civic, and state service which "firmly advanced the reputation of Michigan medicine" and for his "lifetime of devotion in fostering the careers of young medical aspirants and for his abiding humanitarian influence in Michigan society."

Born at Au Train, he obtained degrees at Alma College and Wayne University College of Medicine. In 1932 he opened a general practice office on North Main Street in Vassar. The early forties found him furthering his medical knowledge by being house physician to three New York hospitals.

Along with his busy schedule as a physician and his work as executive officer of the state's medical licensing board, Doctor Swanson was active in Vassar. He has served as chairman of the health division of the City of Vassar's Civil Defense program; as health officer of Vassar Township; as president, secretary, and treasurer of Vassar Rotary Club, and as head of both the Vassar Board of Commerce and its Community Chest.

ADD: IN MEMORIAM

In addition to the names reported in the May "In Memoriam," news of the following deaths has reached the MSMS office. Details will follow in the June issue of *Michigan Medicine.*

Chester Van Appledorn, M.D., Holland, died April 9.

J. Payne Butler, M.D., Detroit, died May 6.

Duncan Campbell, M.D., Howell, died March 25.

Harold E. Clark, M.D., Detroit, died April 5.

Herbert E. Fogt, M.D., Detroit, died April 14.

Frederick S. Hosking, M.D., Lake Linden, died March 26.

Maurice J. Spector, M.D., Detroit, died March 29.

Lauds Careers Mobile

On behalf of the Detroit Medical Society and the National Medical Association, I wish to extend our sincere appreciation to the Michigan State Medical Society and the Michigan Health Council in making the Health Career Mobile available to three of our inner-city high schools.

From all reports which have come to me, the venture was highly successful from the point of view of attendance and enthusiasm among the students. I feel confident that a great deal of good was accomplished. Our Talent Recruitment Committee plans to follow-up with a series of lectures to keep the enthusiasm high.

It is my hope that this liaison between our medical groups will be maintained and strengthened to the benefit of all of us in medicine.

Lionel F. Swan, M.D.
Detroit

WSU Receives $7 Million Grant For Basic Science Building

Construction is scheduled to begin this fall, with completion estimated for the spring of 1970, for Wayne State University's new Basic Science Building.

The $7 million federal grant to help finance the building was announced May 8 by the United States Public Health Department.

To be located in the Wayne State Medical Center, the building will adjoin Grace and Harper Hospitals.

This new building will be a major step toward increasing our entering class of medical students from 125 to 200, Gordon H. Scott, Ph.D., Vice President for WSU Medical School Development, said.

The United States Public Health Service grant, the largest ever received by Wayne State, is the second part of the federal government's share of cost in the proposed $23 million building. Six months ago the first portion of the grant, $4.7 million, was made to cover the cost of research facilities. The second portion will be used to pay for teaching facilities.

The State of Michigan will reportedly contribute the remaining $11.3 million.

The nine-story Basic Science Building will house the departments of anatomy, psychology, pharmacology, biochemistry, microbiology, and pathology, and it will be equipped with 32 laboratories, closed-circuit television, and two-story lecture halls.

CONVOCATION, MAY 20

The convocation honoring the the WSU Medical School Class of 1967 will be held at 2:30 p.m. Saturday, May 20, at the Rackham Building at Farnsworth and Woodward.

ANOTHER PUBLIC SERVICE

The Bay-Arenac-Iosco County Medical Society has passed a resolution to establish a telephone referral system so that newcomers can choose, from an established list, a physician who is willing to accept new patients. The Society will list a society telephone number in the next telephone directory.

MICHIGAN MEDICINE
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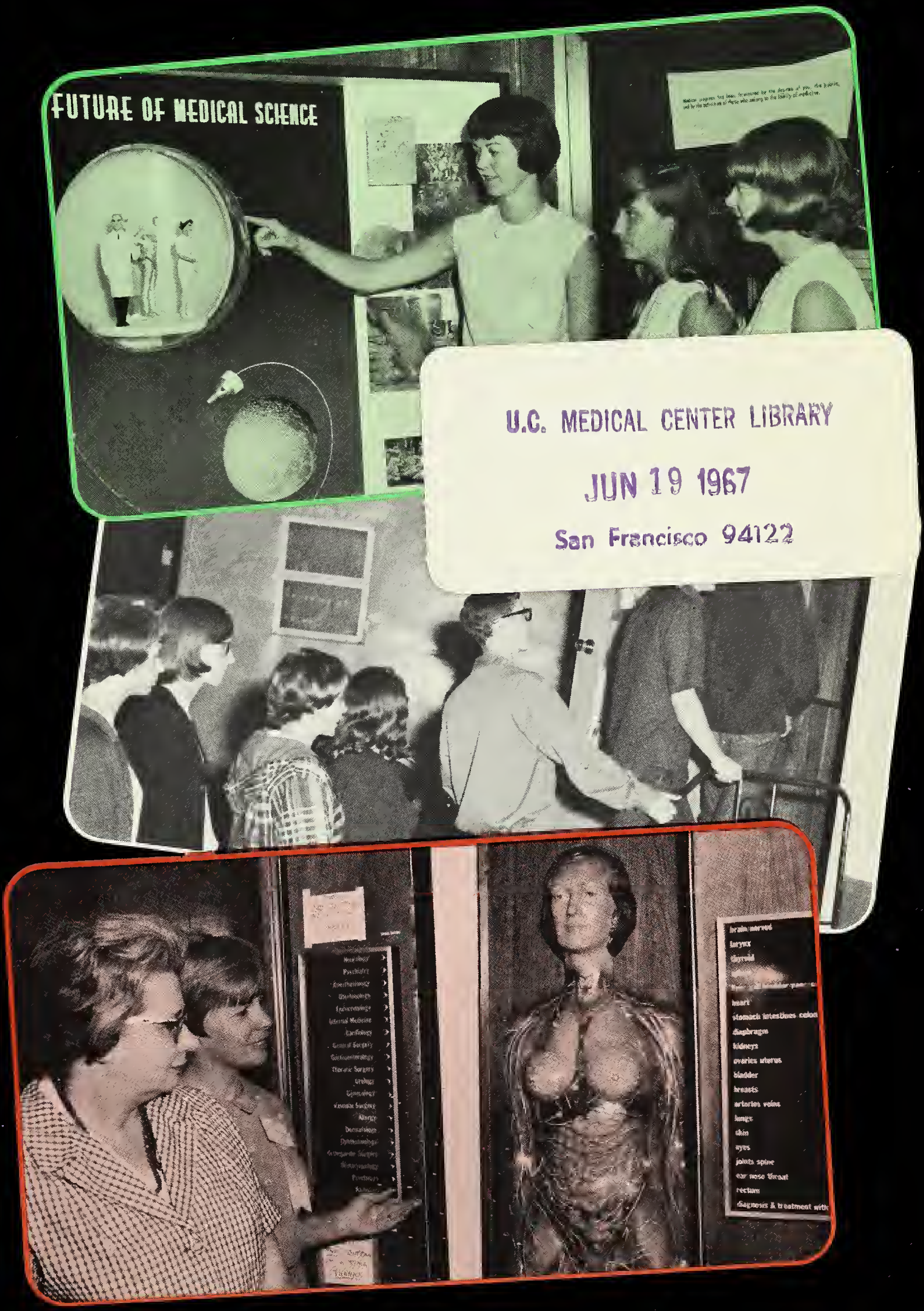
MICHIGAN MEDICINE

MICHIGAN STATE MEDICAL SOCIETY
VOLUME 66, NUMBER 11
JUNE, 1967

The Michigan Health Careers Mobile, with many new exhibits, continues to roll from community to community to interest young people in careers in medicine and health. The impressive mobile unit this year is being coordinated by the Michigan Health Council. Promotion and hosting on the community level are undertaken enthusiastically by the county medical societies, women's auxiliaries, schools, hospitals, and other community groups interested in young people and good health care.
MSMS is one of the financial sponsors.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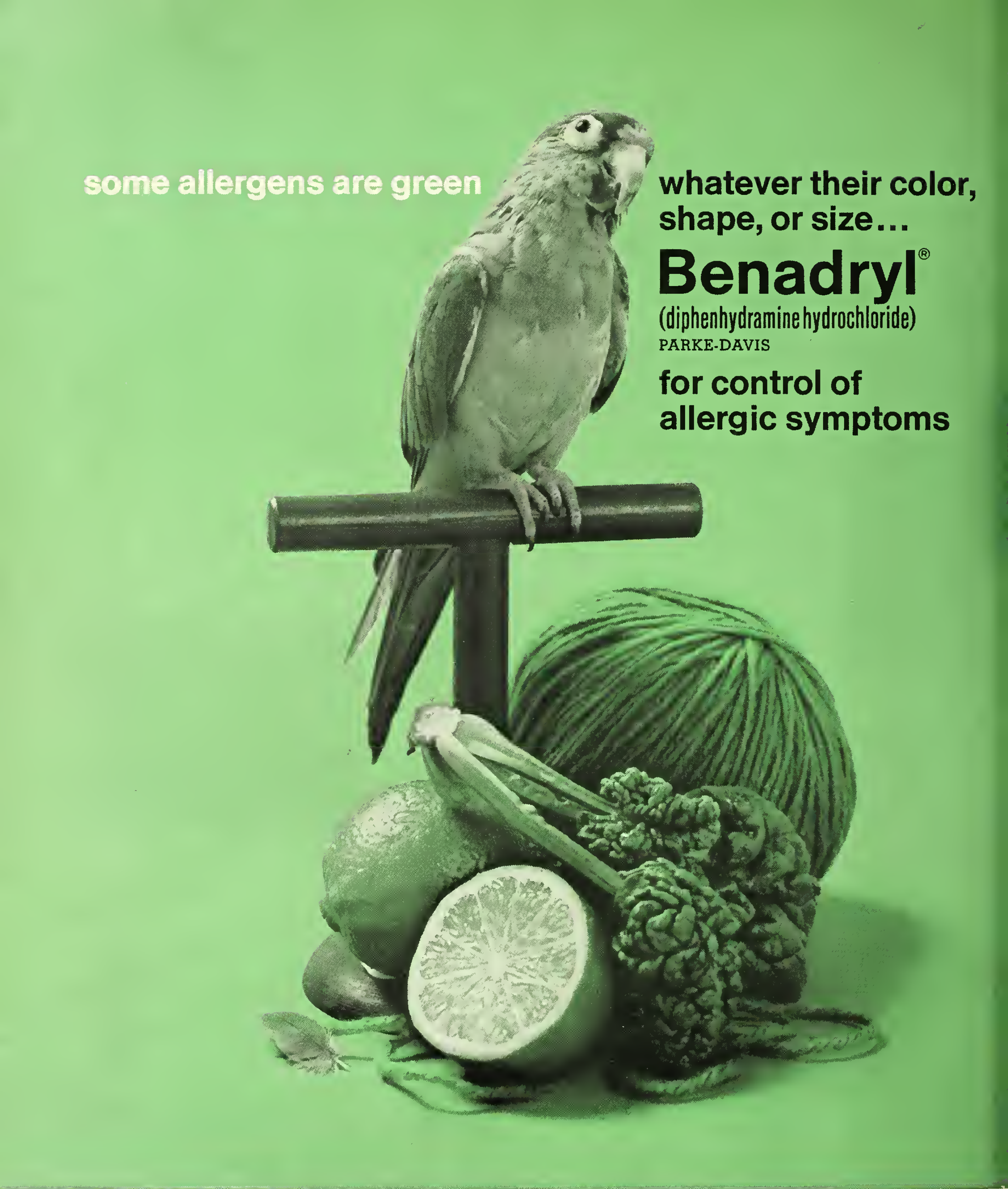
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TABLETS & GRANULES

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References:

(1) Siver, R. H.: CMD, *21*:109, September 1954. (2) Frykman, H. H.: Minn. Med., *38*:19-27, January 1955. (3) McGivney, J.: Tex. State Jour. Med., *51*:16-18, January 1955. (4) Quehl, T. M.: Jour. of Florida Acad. Gen. Prac., *15*:15-16, October 1965. (5) Weekes, D. J.: N.Y. State Jour. Med., *58*:2672-2673, August 1958. (6) Weekes, D. J.: EENT Digest, *25*:47-59, December 1963. (7) Abbott, P. L.: Jour. Oral Surg., Anes., & Hosp. Dental Serv., 310-312, July 1961. (8) Rapoport, L. and Levine, W. I.: Oral Surg., Oral Med. & Oral Path., *20*:591-593, November 1965.

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Composition: Each Mylanta chewable tablet or teaspoonful (5 ml.) of liquid contains: magnesium hydroxide, 200 mg.; aluminum hydroxide, dried gel, 200 mg.; simethicone, 20 mg. **Dosage:** one or two tablets, well chewed or allowed to dissolve in the mouth, or one or two teaspoonfuls of liquid to be taken between meals and at bedtime.

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MICHIGAN MEDICINE

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The cover this month focuses attention on the Michigan Health Careers Mobile. The photos are typical of those taken in many communities where students study the exhibits about medical careers and medical progress in Michigan. Two articles about the Health Careers Mobile, a project now of the Michigan Health Council, appear on page 761.

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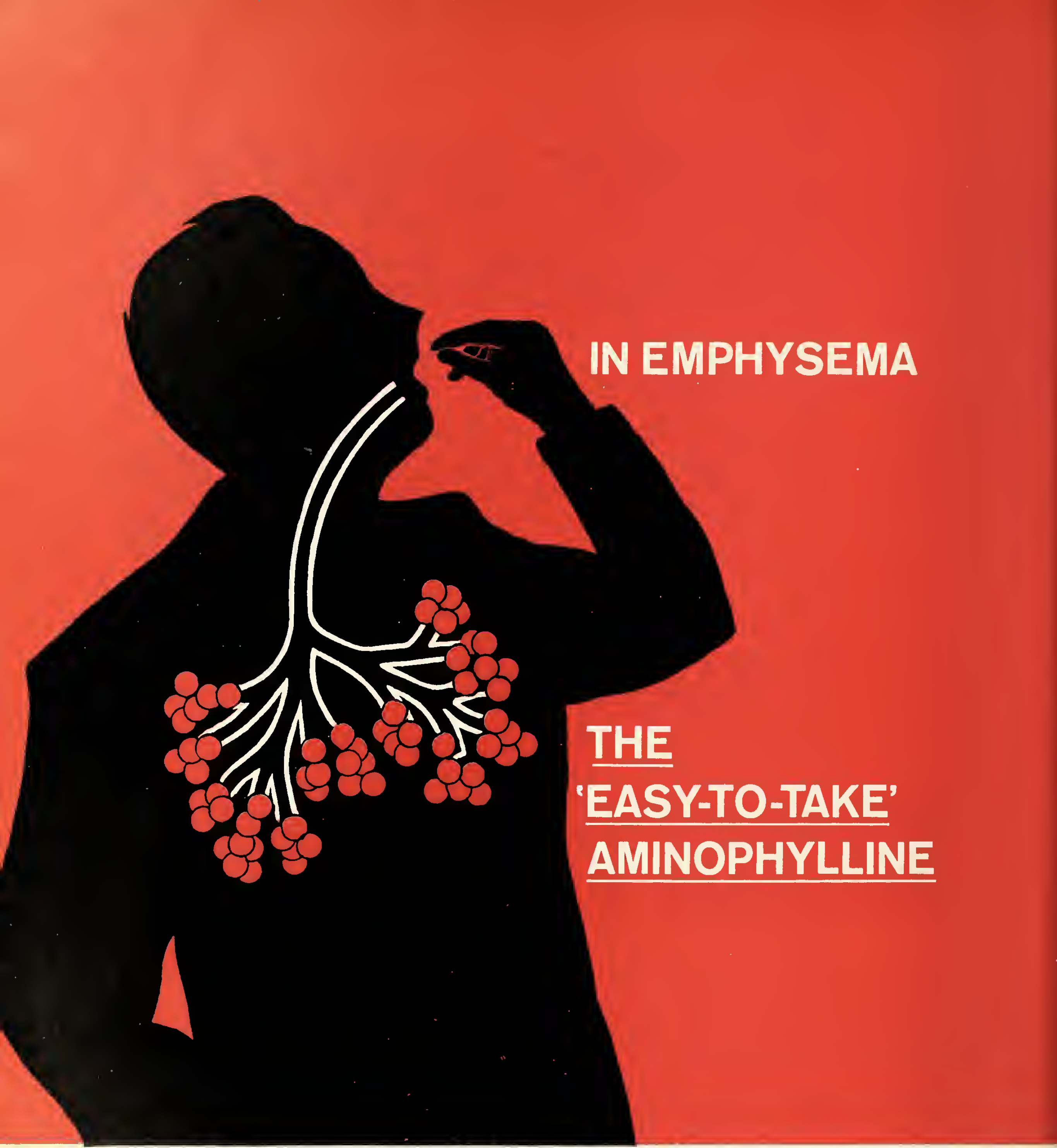

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president's message

SB 227 IS DANGEROUS

Michigan Doctors of Medicine have great fears for the health of the people if Senate Bill No. 227 is passed by the House of Representatives.

The bill is dangerous and should not pass.

Quality health care in Michigan will be endangered if the bill should become law.

Physicians, patients and friends are pointing out the pitfalls in the proposed bill:

1. The bill is dangerous because it permits the use of X-ray by chiropractors without imposing vitally-important limitation upon its use.

2. The bill is dangerous because it adds much unnecessary language that can only result in confusion about the chiropractor's legal limitations.

3. The bill is dangerous because it could give chiropractors the right to use analytical instruments in the examination of patients — with only the chiropractors deciding what instrument they can use.

4. The bill is dangerous because it would tend to give status to chiropractors beyond the definition of what chiropractic is.

5. The bill is dangerous because it tends to give chiropractors much more latitude in their trade by giving them authority to carry out procedures "for the restoration and maintenance of health."

6. The bill is dangerous because it would amend Section Six of the Act No. 145 of the Public Acts of 1933 which defines the limits of chiropractic. For 20 years chiropractors have sought to expand this section.

7. The bill is dangerous because it comes at a time when there is growing concern throughout the nation about chiropractic, which is not based on scientific principles.

8. The bill is dangerous because it tends to give even more false hope to people who may have allergies, diabetes, heart trouble, tonsillitis and even cancer. These cannot be cured by adjusting or manipulating certain areas of the spinal column.

Many thinking legislators understandably are opposed to the bill because action is proposed without the advantages of a throughly scientific examination of chiropractic and a hearing on the health dangers in the law relating to X-ray, diagnostic instruments, etc.

The bill should be rejected as unwise, unnecessary and — not in the public interest.

C. Allen Payne MD

Optimil
20

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THE OPTIMUM-NUTRITION INFANT FORMULA

OPTIMUM CONTENTMENT

New Optimil's marked superiority in achieving satiety — reflected by infants' infrequent crying — is most reassuring to mothers.

Excessive appetite and inordinate crying in the infant are symptoms of essential fatty-acid deficiency. There may be insufficient linoleic acid in the diet, or the conversion of linoleic to metabolically-active arachidonic acid may be blocked by an inhibitory fatty acid. Optimil maintains optimum tissue levels of arachidonic acid by providing linoleic acid at 9% of total calories, with only a trace of linolenic acid, the potent blocking agent.[1-5]

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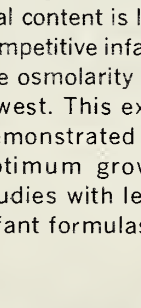

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1. Hepner, R., et al.: Pediatrics 33:94, 1964. 2. Hepner, R., et al.: Pediatrics (to be published). 3. Hansen, A. E., et al.: Pediatrics 31:171, 1963. 4. Holman, R. T.: Fed. Proceed. 23:1062, 1964. 5. Holman, R. T., et al.: Amer. J. Clin. Nut. 14:83, 1964. 6. Young, R. J., and Garrett, R. L.: J. Nut. 81:321, 1963. 7. Hepner, R.: "New Perspectives on Nutritional Aspects of Modified Milk-Fat Formulas," a colloquium held under the auspices of The Pediatric Department, Western Reserve University School of Medicine, Cleveland, Ohio, Sept. 8, 1966. 8. Carson, M., and Hart, L.: ibid. 9. Nichols, M.: ibid.

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Parepectolin for quick relief of acute diarrhea
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and protects intestinal mucosa

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Contains opium (¼ grain) 15 mg. per fluid ounce.
warning: may be habit forming
Pectin .... (2½ grains) 162 mg.
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(alcohol 0.69%)
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Sees Megalopolis From Pittsburgh To Milwaukee

Detroit may become the center of a budding Great Lakes megalopolis that will be more significant than the much-heralded Boston to Baltimore megalopolis, according to a report in a Michigan State University business publication.

The growth of the Great Lakes megalopolis is outlined by Peter B. Spivak, Chairman of the Michigan Public Service Commission, in the current issue of the *Michigan State Economic Record.*

"There will be a great city," he says, "stretching from Pittsburgh to Cleveland, Toledo, Detroit, Ann Arbor, Jackson, Battle Creek, Kalamazoo, Grand Rapids, South Bend, Chicago, and on to Milwaukee. Flint, Saginaw, Bay City and Midland will be within its boundaries."

The role of the Detroit area, according to Mr. Spivak, will be that of a major trade and transportation center, because it is the crossroads of important land, water, and transportation routes.

By the year 2,000 Michigan's population will be 15.4 million, twice its present figure, Mr. Spivak says. And 97 percent of the state's citizens will live in the megalopolis area, he adds. The Great Lakes megalopolis, according to Mr. Spivak, will encompass 41.5 percent of Michigan's 57,019 square miles.

Heart Association Offers Desk Cards

A set of desk reference cards dealing with the medical problems of rehabilitation of stroke patients, prepared by the Stroke Committee of the Michigan Heart Association, is available free to physicians. Carl B. Beeman, M.D., Grand Rapids, President of the Heart Association, urges physicians to phone Detroit 342-2100 or write to the Medical Director, Michigan Heart Association, 13100 Puritan, 48227 for the cards.

The 13 subdivisions of the card are: (1) Preamble, (2) Positioning and exercise; acute stage, (3) Decubitus ulcers, (4) Bladder and bowel training, (5) Communication disorders, (6) Psychiatric, (7) Supportive psychotherapy, (8) Activities of daily living, (9) Upper extremity support, (10) Pre-ambulation and transfer activities, (11) Ambulation, (12) Vocational rehabilitation, (13) References and suppliers.

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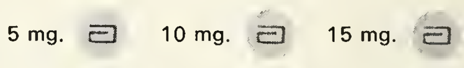

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Typically, the obese patient is a repeat dieter. And with each failure, the task looks more hopeless. Therefore, it is often just as important to lift the mood as to curb the appetite. Desoxyn Gradumet does just that. It gently elevates and sustains the mood. And no other product—amphetamine or non-amphetamine—is more effective in suppressing appetite.

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Desbutal Gradumet contains 2 drugs, each in its own tablet section, combined back to back to form a single tablet. One section contains Desoxyn to suppress the appetite and lift the mood; the other contains Nembutal® (pentobarbital) to soothe the patient and counteract any excessive stimulation. The drugs are released in an effective dosage ratio throughout the day.

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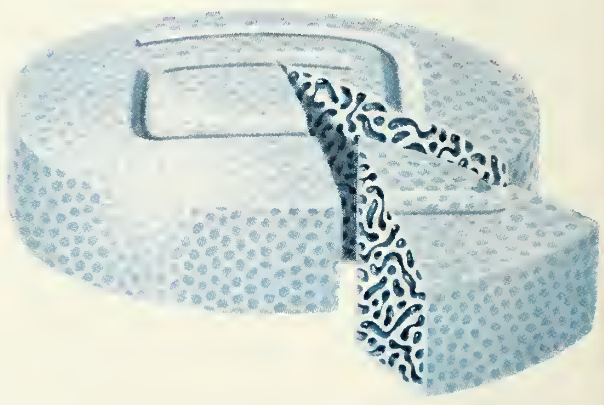
HOW IT DIFFERS FROM LONG-RELEASE

The Gradumet is made up of thousands of interconnecting channels, much like a sponge. These channels—filled with a drug—end at the outer surface of the tablet. When fluid comes in contact with the Gradumet, the drug in the outer ends of the channels dissolves. As the fluid makes its way up the channels, there is a continuous release of medication.

Since the rate of release is rigidly determined by the size and number of channels, the Gradumet is able to provide controlled-release as well as long-release. Patients get a measured amount of medication, moment by moment, throughout the day—from a single oral dose.



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THE PROGRAM

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To help your obese patients understand why they are overweight—and what they can do about it—Abbott has a booklet called "The Secret of Controlling Your Weight." *It is available to your patients only through you.*

Here is a partial list of the topics covered:

Why you are overweight
Rewards of weight reducing
Balanced meals
Helpful hints
Hunger between meals
Snacks
Weekly weighings
Exercise
Holidays, vacations, special events
Leanness and longevity

Each topic is covered on one page in simple and easy-to-understand language. At the back of the booklet, there is a list of 160 foods showing their caloric content.

the
secret
of
controlling
your weight

FOOD DIARY

The Food Diary is designed to help the overweight patient follow your eating instructions. Space is provided for breakfast, lunch, supper, and even snacks. By writing everything down that's eaten each day, the patient is constantly reminded that she's trying to change her eating habits. And you are furnished with a written record of how well she's doing.

This booklet also lists the caloric content of 160 foods.

See Brief Summary on next page.

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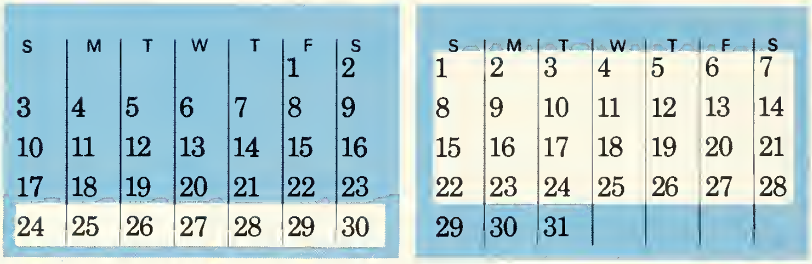

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3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30

S	M	T	W	T	F	S
1	2	3	4	5	6	7
8	9	10	11	12	13	14
15	16	17	18	19	20	21
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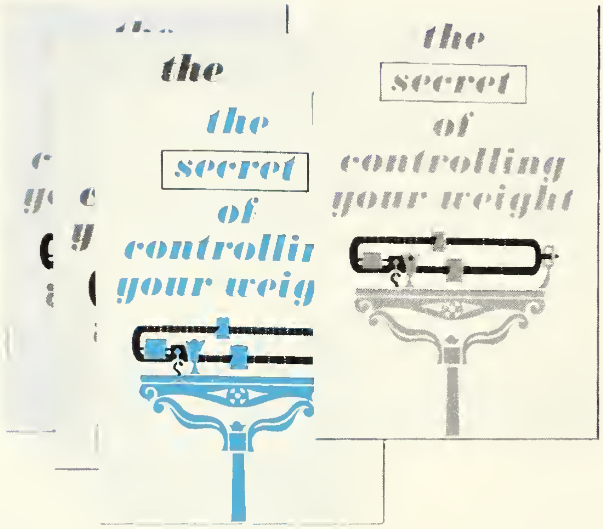
the secret of controlling your weight
the secret of controlling your weight

There are four weight control booklets, each with the same text, but with a different sample in the back of the booklet to meet your individual patient's needs. You have your choice of Desoxyn Gradumet in 10 mg. or 15 mg. strengths as well as Desbutal 10 Gradumet and Desbutal 15 Gradumet. The Food Diary is the same for all of the weight control booklets.

Your Abbott man will be happy to supply you with booklets. Just ask him.

CONTRAINDICATIONS: Methamphetamine (in Desoxyn and Desbutal) is contraindicated in patients taking a monoamine oxidase inhibitor. Do not use pentobarbital (in Desbutal) in persons hypersensitive to barbiturates.

PRECAUTIONS, SIDE EFFECTS: Observe caution in patients with hypertension, cardiovascular disease, hyperthyroidism, old age, or those sensitive to sympathomimetic drugs. Prolonged usage may lead to tolerance or psychic dependence. Careful supervision is necessary to avoid chronic intoxication and addiction.

Amphetamine side effects such as a headache, excitement, agitation, palpitation or cardiac arrhythmia usually may be controlled by reducing the dose. Paradoxically-induced depression is an indication to withdraw the drug. Pentobarbital (in Desbutal) may cause skin rash. Nervousness or excessive sedation with Desbutal is usually transient.

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The fast-disintegrating uncoated tablet gives relief in 15 minutes

Each tablet contains:

Potassium Iodide	195 mg.
Aminophylline	130 mg.
Phenobarbital, Caution: May be habit forming...	21 mg.
Ephedrine HCl	16 mg.

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Precautions: Usual for aminophylline-ephedrine-phenobarbital. Iodides may cause nausea, long use may cause goiter. Discontinue if symptoms of iodism develop.

Iodide contraindications: tuberculosis, pregnancy.

DOSAGE

One tablet, with full glass of water, 3 or 4 times daily.

Dispensed in bottles of 100 and 1000 tablets.

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MUDRANE GG ELIXIR—Four 5 cc teaspoonfuls is equivalent to one Mudrane GG tablet. Dosage adjusted to age and weight of child. Mudrane GG Elixir is for pediatric patients and those who think they cannot swallow tablets. Dispensed in pint and half gallon bottles.

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Urges Michigan Week Efforts Be Continued

"The activities and attitudes of Michigan Week should be extended throughout the year."

So states Brock E. Brush, M.D., Detroit, Chairman of the MSMS Public Relations Committee.

"With its excellent opportunities to promote the profession of medicine in countless ways — career recruitment, medical advances, social concerns — Michigan Week could easily be incorporated into daily activity," Doctor Brush adds.

"Physicians should also use every opportunity during Michigan Week and throughout the year," Chairman Brush says, "to encourage medical students and others preparing for health careers to use their professional talents in the state of Michigan."

(The cover of Michigan Medicine in May suggested that "Michigan Week, May 21-27 — A Dual Opportunity to Promote Medicine and Michigan)

PINKERTON HONORED

Owen R. Pinkerton, Director of William Beaumont Hospital, Royal Oak, will become president of the Tri-State Hospital Assembly in 1968. He was chosen president-elect at the recent Assembly convention.

Edgar C. Kruse, Fort Wayne, is the current president.

Mr. Pinkerton, Director of Beaumont for 14 years, was formerly administrator of Detroit Memorial Hospital. He is a past president of the Michigan Hospital Association and also of the Greater Detroit Hospital Council.

WIFE OF G.R. PHYSICIAN HEADS NATIONAL YWCA

Mrs. Robert Claytor, wife of a Grand Rapids surgeon, was recently elected the first Negro President of the national Young Women's Christian Association.

Formerly president of Grand Rapids YWCA, from 1949 to 1951, she was named to a three-year term at the organization's 24th national convention. She also is a member of the Michigan Youth Commission.

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The Regional Medical Program Concept and Its Application In Michigan

BY NEAL A. VANSELOW, M.D.
ANN ARBOR

ABSTRACT: This paper reviews the current progress that has been made in the Heart, Cancer and Stroke Program in the State of Michigan.

On October 6, 1965, Congress enacted Public Law 89-239 to establish a system of Regional Medical Programs throughout the United States. Otherwise known as the Heart Disease, Cancer, and Stroke Amendments of 1965, this law was a direct outgrowth of a report submitted to President Johnson in December 1964 by a Commission headed by Doctor Michael E. DeBakey.[1, 2] The DeBakey Commission had been instructed by the President in March 1964 to recommend steps to reduce the incidence of heart disease, cancer, and stroke through new knowledge and complete utilization of already available medical knowledge. Public Law 89-239 was based on three of the 35 recommendations of this commission.[3] The purposes of the law were as follows:

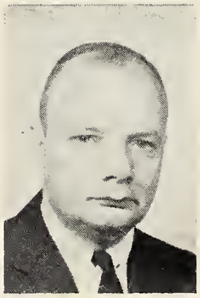
1. "Through grants, to encourage and assist in the establishment of regional cooperative arrangements among medical schools, research institutions, and hospitals for research and training (including continuing education) and for related demonstrations of patient care in the fields of heart disease, cancer, stroke and related diseases;"
2. "To afford to the medical profession and medical institutions of the Nation, through such cooperative arrangements, the opportunity of making available to their patients the latest advances in diagnosis and treatment of these diseases; and"
3. "By these means, to improve generally the health manpower and facilities available to the Nation, and to accomplish these ends without interfering with the patterns, or the methods of financing, of patient care or professional practice, or with the administration of hospitals, and in cooperation with practicing physicians, medical center officials, hospital administrators, and representatives from appropriate voluntary health agencies."

The Regional Medical Program concept has attracted widespread attention as a unique method of federal support for improvement of medical care and has already made important progress toward full implementation. The present article will review the major features of this program with particular attention directed to their application in Michigan.

Principles of the Regional Medical Program Concept

The intent of Public Law 89-239 is to provide federal funds for the establishment of regional cooperative arrangements to combat heart disease, cancer, stroke, and related diseases.

The federal government has made no attempt, however, to define regional boundries other than



AUTHOR

NEAL A.

VANSELOW, M.D.

Doctor Vanselow, associated with the University of Michigan Department of Postgraduate Medicine, was one of the authors of the University of Michigan's Heart, Cancer and Stroke planning program.

to state that each region must be a functionally coherent geographical area which follows existing patterns of patient referral and cooperation among institutions and which contains a sufficient population base for effective planning and use of expensive and complex diagnostic and treatment techniques.[4] On the basis of local initiative 53 regions have already been defined to apply for Heart Disease, Cancer, and Stroke funds. In some instances, as for example the Michigan region, regional boundaries coincide with state boundaries. In other instances, several states or portions of states have joined to form a region (e.g. The Intermountain region which includes Utah and portions of Wyoming, Montana, Idaho, and Nevada). A third category consists of regions composed of one geographical segment of a single state. The New York metropolitan area is an example of such a region.

Within each region there must be an applicant which will translate the regional plan for heart disease, cancer, stroke, and related diseases into planning and/or operational grant requests. These are submitted to the Division of Regional Medical Programs of the National Institutes of Health (NIH). The latter, under the direction of Robert Q. Marston, M.D., former Dean of the University of Mississippi School of Medicine, has been given the task of administering Regional Medical Programs at the national level.

In some cases the regional applicant has been an existing institution within the region such as a university, state medical society, or state health department; in other cases, as in Michigan, a new non-profit corporation has been formed to act as the applicant. An important provision of the legislation is the requirement that each region create a Regional Advisory Group to assist in the planning of the program within the region and approve operational grant applications prior to their submission to NIH. This advisory group must be representative of geographic areas and of social groups served by the regional program and must include practicing physicians, medical-center officials, hospital administrators, and representatives of appropriate medical societies, other health professions, voluntary health agencies, and the public.

Grants made for planning and operation of regional medical programs are restricted at the present time to categorical projects which can be shown to have direct significance for combating heart disease, cancer, stroke, and related diseases. The term "related diseases" has not been defined clearly as yet. It is obvious that major emphasis is being placed upon two types of activities: education and training of physicians and allied health personnel and demonstrations of patient care in heart disease, cancer, stroke, and related diseases.

Continuing education of physicians, nurses, laboratory technicians, pharmacists, and other health personnel deserves special mention. It is anticipated that the Heart Disease, Cancer, and Stroke Program will provide the impetus for an expansion of presently existing programs of continuing education as well as for the institution of new training programs and techniques.

Most of the emphasis will be placed upon training individuals who have already completed the basic preparation for work in the health field, with much less concentration on support of medical-student, intern, and resident training and basic education and training in allied health areas.[5] One facet of the emphasis on continuing education is the expressed interest of the Division of Regional Medical Programs in supporting electronic communication systems within a region. Closed-circuit television communication networks, radio or telephone networks, and electronic networks for the transmission of data such as electrocardiograms are types of activities for which funds may be available. It is obvious that these communication devices are potentially important aids in diagnosis and education.

The Heart Disease, Cancer, and Stroke Program also provides for support of demonstration facilities of patient care. Coronary intensive-care units, stroke intensive-care units, cancer chemotherapy units, and drug information centers are examples of such demonstration activities. In order to qualify for support, however, such demonstration units must be related to the research, training, and continuing education activities of the regional medical program.

It is apparent that only a limited amount of support will be available for research. The Guidelines for Regional Medical Programs[6] prepared by the Division of Regional Medical Programs of the National Institutes of Health clearly states that research in the fields of heart disease, cancer, stroke, and related diseases can be supported only if it is essential to the effective accomplishment of the objectives of a regional medical program and if other sources of support are not available. Similarly, the funds available for alteration and renovation of presently existing facilities will be sharply limited. No funds are available as yet for new construction.

Several principles of the legislation merit discussion. Neither Congress nor the National Institutes of Health have attempted to rigidly specify the type of programs which must be instituted in each region. Rather, the emphasis has been placed upon local initiative, with each individual region determining those specific projects which will have the greatest ultimate effect on the care of patients with heart disease, cancer, stroke, and related diseases within its boundaries.[7] It is required, however, that each project undertaken as part of a regional medical program have region-wide application and be integrated into a master plan for the region. There must also be some built-in mechanism for evaluating the effectiveness of each project.

Two types of federal grants are available: *planning grants* which provide funds to develop a regional medical program, and *operational grants* which will finance the actual training, demonstration, and research projects themselves. As of November 1966, 34 planning grants had been approved by the Division of Regional Medical Programs. A few operational grants have been awarded recently.

The Regional Medical Program in Michigan

Planning for a regional medical program in Michigan began shortly after Public Law 89-239 was passed in October 1965. Preliminary discussion among the deans of the three medical schools in Michigan, practicing physicians, hospital administrators, and other interested persons resulted in two basic decisions:

1. The "region" would include the entire State of Michigan.
2. Rather than work through an existing institution as had been done in some regions, a new non-profit corporation would be created to develop and administer the regional medical program for Michigan. This new entity, the Michigan Association for Regional Medical Programs (MARMP), was incorporated in May 1966 under the laws of the State of Michigan.

MARMP has two basic functions: to develop a single regional medical program for the Michigan region, translating this into planning and/or operational grant requests to NIH; and to administer the regional medical program for Michigan after grants are received.

The structure of MARMP (Figure 1) consists of a Regional Advisory Committee and a Board of Directors elected by and from the Regional Advisory Committee. The 22-member Regional Ad-

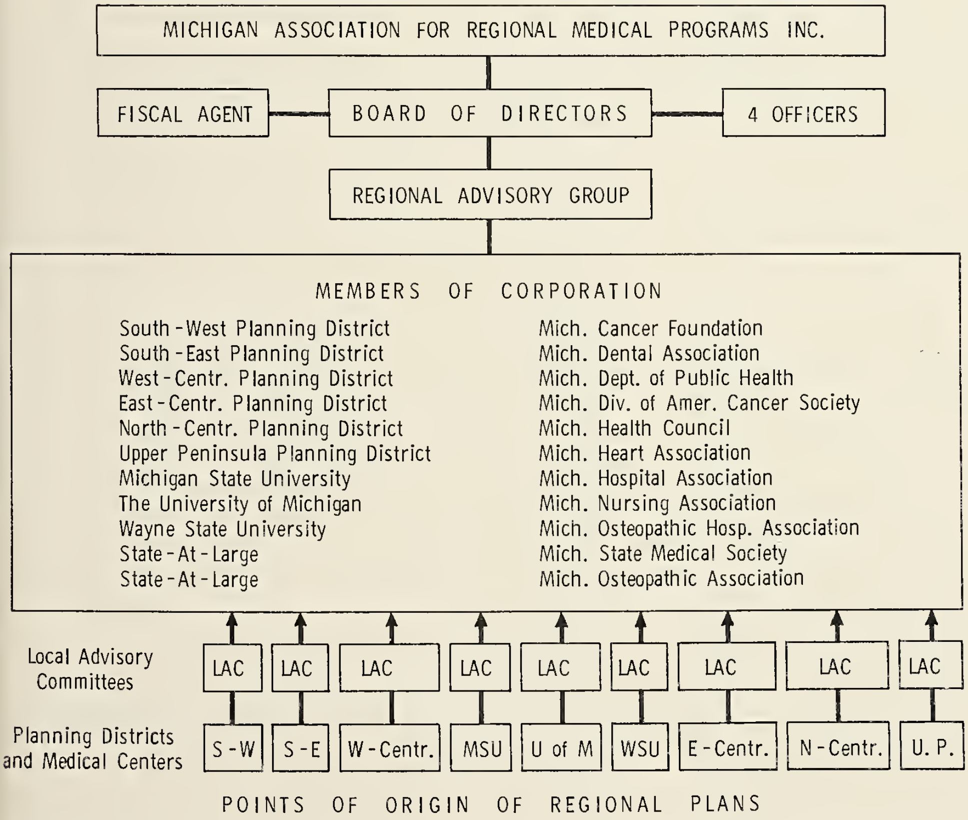

MICHIGAN ASSOCIATION FOR REGIONAL MEDICAL PROGRAMS INC.
FISCAL AGENT
BOARD OF DIRECTORS
4 OFFICERS
REGIONAL ADVISORY GROUP
MEMBERS OF CORPORATION
South-West Planning District
South-East Planning District
West-Centr. Planning District
East-Centr. Planning District
North-Centr. Planning District
Upper Peninsula Planning District
Michigan State University
The University of Michigan
Wayne State University
State-At-Large
State-At-Large
Mich. Cancer Foundation
Mich. Dental Association
Mich. Dept. of Public Health
Mich. Div. of Amer. Cancer Society
Mich. Health Council
Mich. Heart Association
Mich. Hospital Association
Mich. Nursing Association
Mich. Osteopathic Hosp. Association
Mich. State Medical Society
Mich. Osteopathic Association
Local Advisory Committees
LAC
LAC
LAC
LAC
LAC
LAC
LAC
LAC
LAC
Planning Districts and Medical Centers
S-W
S-E
W-Centr.
MSU
U of M
WSU
E-Centr.
N-Centr.
U. P.
POINTS OF ORIGIN OF REGIONAL PLANS

Figure 1. Organization of regional medical program for heart disease, cancer, stroke, and related diseases for the State of Michigan.

Composition of MARMP Advisory Committee

NAME	AGENCY
Carl B. Beeman, M.D.	Michigan Heart Association
Esther Benjamin, R.N.	Michigan Nurses Association
Michael J. Brennan, M.D.	Michigan Cancer Foundation
Dorothy E. Carnegie, D.O.*	Osteopathic Physicians and Surgeons
Earl E. Gongdon, D.O.	Michigan Osteopathic Hospital Association
John A. Doherty*	Michigan Health Council
John F. Edmondson*	Upper Peninsula District
Ernest D. Gardner, M.D.*	Wayne State University
Albert E. Heustis, M.D.	Michigan State Department of Public Health
William N. Hubbard, Jr., M.D.*	University of Michigan
Andrew D. Hunt, Jr., M.D.*	Michigan State University
Bernard E. Luck, D.D.S.	Michigan State Dental Association
Don Marshall, M.D.*	Michigan State Medical Society
John H. Patriarche	Southwest District
John C. Peirce, M.D.	West Central District
Milton D. Rasmussen	North Central District
James P. Ricker	Michigan Division, American Cancer Society
Milton Sacks	East Central District
D. Eugene Sibery	Southeast District
Phillip C. Sims	Public-at-large
Ronald D. Yaw	Michigan Hospital Association
To be appointed	Public-at-large

* Denotes member of MARMP Board of Directors

Table 1. Membership of Regional Advisory Committee, Michigan Association for Regional Medical Programs, Inc.

visory Committee (Table I) includes representatives from each of the three medical schools, two state-at-large members representing the public, representatives from 11 statewide agencies and professional organizations, and a representative of each of six health planning districts in Michigan.

The health planning districts coincide with those now authorized by the Michigan Health Facilities Planning Council, Blue Cross, and the Regional Councils of the Michigan Hospital Association (Figure 2).

The Board of Directors of MARMP consists of seven members, all of whom are also members of the Regional Advisory Committee. Doctor William N. Hubbard, Jr., Dean of the University of Michigan Medical School, is president of the Board of Directors. The University of Michigan will serve as fiscal agent until an administrative staff is developed for MARMP.

While MARMP has the responsibility for developing the overall regional plan, proposals for programs in the fields of heart disease, cancer, stroke, and related diseases which might fit into this regional plan may originate from any one of the component parts of the corporation. For example, a community hospital in the East Central District might originate a plan to improve its program of continuing education in the fields of heart disease, cancer, and stroke. It could submit this plan to the East Central District Local Advisory Committee. If approved, it would be forwarded to the Regional Advisory Committee.

To win the support of the Regional Advisory Committee, the proposal would have to fit into the master plan for the region, must have regionwide impact, and must include a mechanism to evaluate the degree to which it accomplished its intended objectives. If approved by the Regional Advisory Committee, the proposal would be forwarded to NIH as a grant request. An alternative approach which might be used by the community hospitatl would be to collaborate with a university in the region. The proposal would then be made jointly by the community hospital and the university and would require approval by the university's local advisory committee before it was transmitted to the Regional Advisory Committee. The regional medical program in Michigan is thus flexible and permits local groups to prepare projects either on a district level or by working with a university, voluntary health agency, or other statewide organization.

The type of regional medical program which may be expected to emerge in Michigan can be seen by examining the initial grant application submitted to the Division of Regional Medical Programs of NIH by MARMP. The initial application contained a request for planning funds only, since money is not available as yet for operational projects. Submitted in December 1966, it

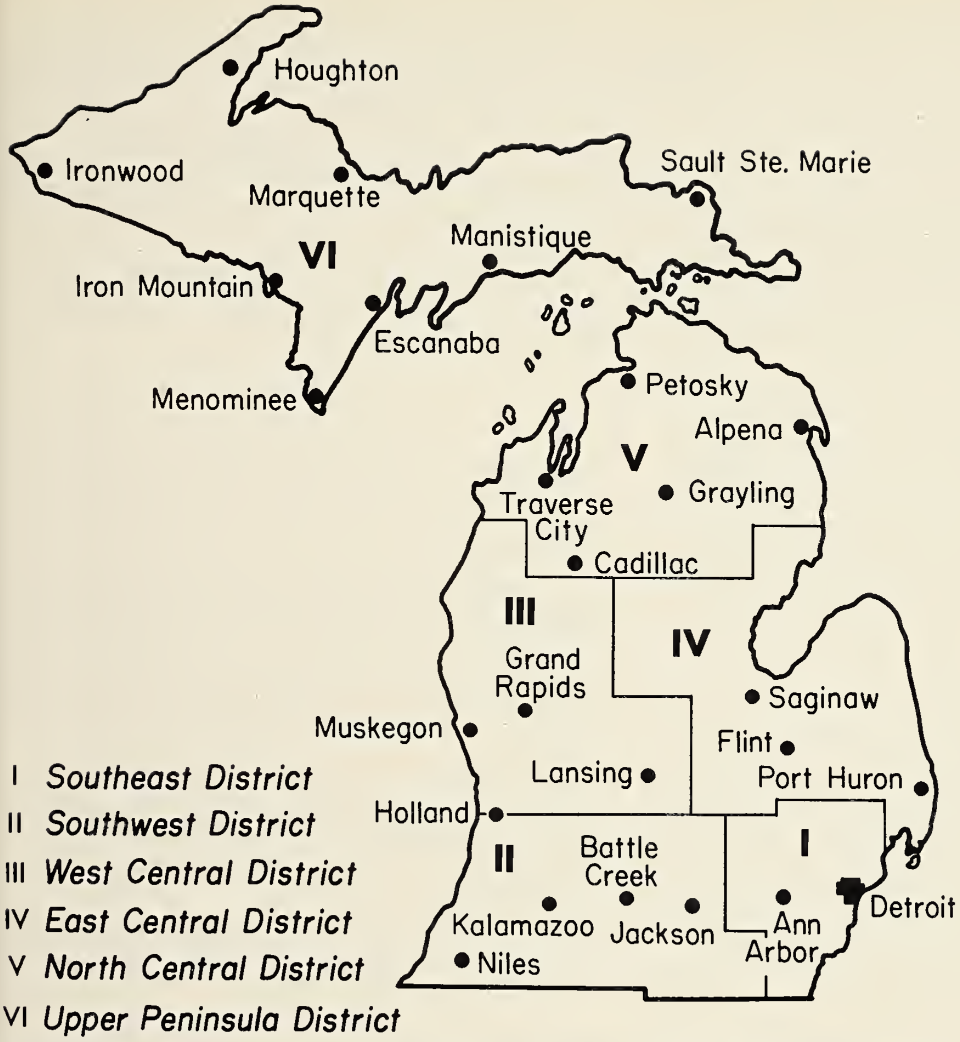

Houghton
Ironwood
Marquette
Sault Ste. Marie
Manistique
VI
Iron Mountain
Escanaba
Menominee
Petosky
Alpena
V
Grayling
Traverse City
Cadillac
III
IV
Grand Rapids
Saginaw
Muskegon
Flint
Lansing
Port Huron
Holland
I
II
Battle Creek
Detroit
Kalamazoo
Jackson
Ann Arbor
Niles
I Southeast District
II Southwest District
III West Central District
IV East Central District
V North Central District
VI Upper Peninsula District

Figure 2. Planning districts of the Michigan Association for Regional Programs, Inc.

requests funds to establish a central planning staff for MARMP. More importantly, it lists the areas in which the regional medical program in Michigan will become involved. These include:

1. Automated multiphasic screening;
2. Improvement of diagnostic and treatment resources through the continuing education of physicians, improvement of nursing care, greater utilization of non-nursing personnel in the care of patients with heart disease, cancer, and stroke, improvement of demonstration facilities for patient care, quality control programs for laboratory tests, and a drug information and analysis center;
3. Development of rehabilitation services;
4. Development of dental services;
5. Improved and coordinated research programs.

Procedural aspects which MARMP feels may be relevant to many of its projects include:

1. Evaluation of resources and needs in the region, including study of patient load, care patterns, personnel and facilities;
2. Collection and utilization of data for initial evaluation, continuing utilization review, and evaluation of effects of programs;
3. Further development and evaluation of existing sources of data;
4. Assessment of cooperative arrangements;
5. Improvement of communication mechanisms and procedures throughout the region including a telecommunication network;
6. Experimentation with new techniques of postgraduate medical education, including "sabbatical leaves" for practicing physicians and

the "lend-lease" of university faculty members to community hospitals in the region.

The broad areas of interest indicated in MARMP's December 1966 planning grant request were defined in more detail in a supplemental planning grant request submitted to NIH in January 1967. In this supplemental request MARMP proposed to utilize the talents, resources, and facilities of four of its component institutions and agencies to initiate the regional medical program in Michigan. These include: Michigan State University, Wayne State University, the Michigan Department of Health, and the University of Michigan. Specific proposals were made for implementation of the broad objectives outlined in the December 1966 application and funds were requested for this purpose. At the present time both the December 1966 and January 1967 applications are under consideration by the Staff and National Advisory Council of the NIH Division of Regional Medical Programs.

Summary

The concept of a series of federally supported regional medical programs to improve the care of patients with heart disease, cancer, stroke, and related diseases is making important progress toward full implementation. Local initiative in development of each regional plan and cooperation among practicing physicians, voluntary and governmental health agencies, and universities in each region are important principles of this program. Major emphasis will be placed upon continuing education for physicians and related health personnel and on the development of demonstration facilities for patient care. The State of Michigan will constitute a single region and will operate a regional medical program under the direction of the Michigan Association for Regional Medical Programs, Inc., a new corporate entity. The Michigan region has begun to formulate a regional plan and has already submitted planning grant requests to the Division of Regional Medical Programs of the National Institutes of Health.

References

1. President's Commission on Heart Disease, Cancer, and Stroke: Report to the President, A National Program to Conquer Heart Disease, Cancer, and Stroke, I, Washington, D.C., United States Government Printing Office, 1964.
2. President's Commission on Heart Disease, Cancer, and Stroke, Report to the President, A National Program to Conquer Heart Disease, Cancer, and Stroke, II, Washington, D.C., United States Government Printing Office, 1965.
3. Russell, J. M. "New Federal Regional Medical Programs," *New England Journal of Medicine,* CCLXXV, 309 (1966).
4. Guidelines for Regional Medical Programs, Bethesda, Division of Regional Medical Programs, National Institutes of Health, United States Department of Health, Education and Welfare, 1966, p. 15.
5. *Ibid.,* p. 41.
6. *Ibid.,* p. 42.
7. Marston, R., and Yordy, K. A Nation Starts a Program: Regional Medical Programs, 1965-66, *Journal of Medical Education,* XLII, 17 (1967).

Summary of Leg Amputations And Prosthetic Replacement

At Wayne County General Hospital During the Five-Year Period 1961 Through 1965

BY STANLEY OLEJNICZAK, M.D.
ELOISE

ABSTRACT — This paper reviews amputations of the leg performed at the Wayne County General Hospital from 1961 through 1965. The reasons for amputation are analyzed as are complications and deaths. The author's recommendation for proper selection of patients is given, and the value of prostheses is analyzed.

The problem of leg amputations and prosthetic replacement is as old as the history of the human race. Through the ages methods of amputation and types of prosthesis have improved. With more accurate diagnosis and advances in surgery, more amputations have been performed, and the mortality rate has decreased. It is now possible for a patient to be fitted with a prosthetic replacement at the same time he undergoes surgery for leg amputation.

It should be pointed out, however, that a patient in poor physical condition may not be a candidate for prosthesis or may not be able to use it successfully. Some patients may have other methods of getting about.[1] The patient and his family cannot be left alone with the problem of ambulation of the amputee, but require proper guidance by the physician. The management of the amputee requires team cooperation. Prior to presentation of the patient to a conference, his physical status must be settled. Such factors as family pressure should not influence the physician in recommending use of a prosthesis.

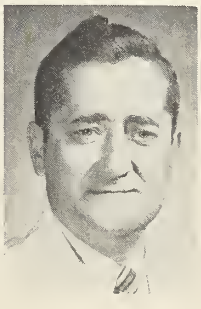
IT IS NOW RARE to encounter difficulty in fitting patients with prosthesis because the stump is not the proper length. Now amputations seldom must be revised because of non-healing, since evaluation including oscillometric studies, as described by Troedsson,[2] enables the proper level of amputation to be chosen. The oscillometer measures the pulsatile variations in size of the limb with each cardiac systole. Details and technique of measurements described by D. Abramson.[3]

Prior to discharge, the amputee is instructed in the method of ambulation. Follow-up visits to his home show staff's continuing interest in his problem.

Our institution has a large population including 3,500 psychiatric patients, approximately 500 general hospital patients, 800 chronically ill infirmary patients, and 1,800 ambulatory, indigent, infirmary patients. Since the number of amputations is quite large, we decided to review the amputations performed during the last five years, both below and above the knee. We inquired into the total number of amputations, the deaths occurring within one month after surgery and their causes, the number of prosthetic replacements, and the number of patients who were totally rehabilitated.

Upon fitting a patient with a prosthesis in instances with borderline indications where there may be doubt concerning his cooperation, a provisional type of prosthesis is furnished. If he should be successful in walking with it, a permanent replacement is ordered. During the training period, we prefer to have the patient using the training leg.

DURING THE PERIOD from 1961 through 1965, 467 amputations either above or below knee


AUTHOR
STANLEY
OLEJNICZAK, M.D.

Doctor Olejniczak is the Director, Department of Physical Medicine and Rehabilitation, Wayne County General Hospital, Eloise.

TABLE I

LEG AMPUTATIONS AT WAYNE COUNTY GENERAL HOSPITAL FROM 1961 TO 1965, INCLUSIVE. (NUMBER, DEATH RATE AND PROTHESES FURNISHED)

YEAR	NUMBER OF AMPUTATIONS	ABOVE THE KNEE		BELOW THE KNEE		DEATH RATE		PROTHESES FURNISHED	
		NO.	%	NO.	%	NO.	%	NO.	%
1961	123	85	69.1	38	30.9	34	27.6	9	7.3
1962	98	65	66.5	33	33.7	17	17.3	7	7.1
1963	115	82	71.3	33	28.7	23	20.0	10	8.6
1964	84	63	82.1	15	10.3	18	21.4	14	16.6
1965	47	33	83.0	8	17.0	21	46.8	6	12.7
TOTAL	467	340	73.0	127	27.0	113	24.1	46	9.9

TABLE II

NUMBER OF AMPUTATIONS AND DEATHS AT WAYNE COUNTY GENERAL HOSPITAL (1961 TO 1965), ACCORDING TO AGE.

AGE	1961		1962		1963		1964		1965	
	NO. OF AMPUTAT.	DEATHS	NO. OF AMPUTAT.	DEATHS	NO. OF AMPUTAT.	DEATHS	NO. OF AMPUTAT.	DEATHS	NO. OF AMPUTAT.	DEATHS
11–20	/	/	/	/	/	/	/	/	5	2
21–30	/	/	1	/	/	/	1	/	/	/
31–40	2	/	1	/	2	/	/	/	2	/
41–50	4	1	9	2	8	/	7	1	4	/
51–60	15	3	16	1	19	3	15	1	3	1
61–70	36	7	32	5	35	4	30	5	13	4
71–80	42	12	26	9	38	10	20	6	8	5
81–90	23	10	10	4	10	5	9	4	10	8
91–100	1	1	3	1	3	1	2	1	2	1
TOTAL	123	34	98	17	115	23	84	18	47	21

were performed on 430 patients. Of 32 patients who had bilateral amputations, 19 were above-the-knee and 8 were below-the-knee; 5 patients had above-knee and below-knee amputations.

Twenty percent of our patients had lumbar sympathectomy 30 to 60 days prior to amputation with the hope of improving the circulation, controling resting pain of the extremities, and healing of ulcerative or gangrenous lesions. No definite conclusions can be drawn from our experience in regard to the benefit from this procedure or ultimate fate of the involved extremity.

Table I indicates the total number of amputations during the respective years; the location of the amputation, either above or below the knee; and the death rate, which was approximately 24 percent. The mortality rate, shown in Table II, indicates that the most critical age for amputations is past 60 years.

Table III lists the amputations among male and female patients and the sites of amputation. There were 204 above-the-knee amputations among males and only 136 among females; of 178 below-the-knee amputations, 49 were among females.

The causes of amputations are enumerated in Table IV, arteriosclerosis with or without diabetes mellitus being the principal cause both among male and female patients. The causes of death within one month after amputation are listed in Table V. Pneumonia was the main cause of death, followed closely by myocardial infarction among patients with above-the-knee amputation. Among the patients with below-the-knee amputation, the chief cause of death was myocardial infarction. No instance of pneumonia was encountered, perhaps because patients with below-the-knee amputations find it easier to move around and are more physically active during the postoperative period. The total death rate is much higher among patients with above-the-knee amputation than among patients with below-the-knee amputations. Ninety-seven patients died after above-the-knee amputations. Ninety-seven patients died after above-the-knee amputations; 16 after below-the-knee amputation.

A TOTAL NUMBER OF 50 prostheses were furnished to 47 patients, representing 10.9 percent

TABLE IIA

NUMBER OF AMPUTATIONS AND DEATHS AT WAYNE COUNTY GENERAL HOSPITAL, EXPRESSED GRAPHICALLY ACCORDING TO AGE (1961- 1965).

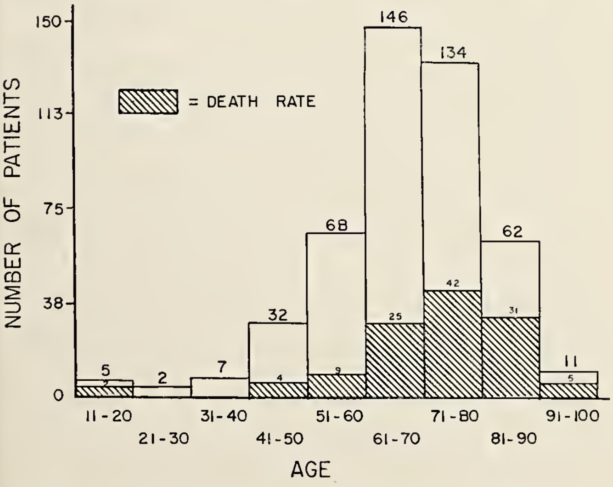


TABLE III

LEVEL OF AMPUTATIONS AMONG MALE AND FEMALE PATIENTS AT WAYNE COUNTY GENERAL HOSPITAL (1961 - 1965)

YEAR	MALE PATIENTS	FEMALE PATIENTS	MALE PATIENTS	FEMALE PATIENTS
	ABOVE THE KNEE	ABOVE THE KNEE	BELOW THE KNEE	BELOW THE KNEE
1961	59	26	28	10
1962	40	25	21	12
1963	43	39	18	15
1964	44	25	4	11
1965	18	21	7	1
TOTAL	204	136	78	49

TABLE IV

CAUSES OF AMPUTATIONS AMONG MALE AND FEMALE PATIENTS AT WAYNE COUNTY GENERAL HOSPITAL. (1961 - 1965)

CAUSES	MALE	FEMALE
ARTERIOSCLEROSIS OBLITERANS	183	111
ARTERIOSCLEROSIS OBLITERANS DIABETES MELLITUS	62	51
POSTRAUMATIC	11	10
THROMBOPHLEBITIS	8	4
OSTEOMYELITIS	12	7
CANCER	1	1
MISCELLANEOUS: UREMIA SHOCK COMPLICATIONS OF D. MELLITUS	5	1

of all the amputees. Table VI lists other pertinent details of the 47 patients, 26 of whom were sponsored by Vocational Rehabilitation assistance and returned to work.

Our evaluation of amputations is comparable with the results obtained by M. G. Otteman[4] from the Philadelphia General Hospital and R. B. Thompson from Columbia Presbyterian Medical Center.[5]

TABLE V

CAUSES OF DEATH AFTER AMPUTATION AMONG MALE AND FEMALE PATIENTS AT WAYNE COUNTY GENERAL HOSPITAL (1961–1965).

CAUSE	ABOVE THE KNEE		BELOW THE KNEE	
	NUMBER	PERCENT OF TOTAL DEATHS	NUMBER	PERCENT OF TOTAL DEATHS
PNEUMONIA	27	23.9	0	0
MYOCARDIAL INFARCTION	25	22.1	8	7.1
SEPTICEMIA	17	15	2	1.7
HEART FAILURE	12	10.6	3	2.6
CEREBRO-VASCULAR "ACCIDENT"	6	5.3	0	0
PULMONARY INFARCTION	3	2 6	1	0.3
MISCELLANEOUS	7	6.2	2	1.7

TABLE VI

AMPUTEES FURNISHED WITH A PROTHESIS AT WAYNE COUNTY GENERAL HOSPITAL. (1961 – 1965)

	MALE	FEMALE
ABOVE THE KNEE AMPUTATION	10	2
BELOW THE KNEE AMPUTATION	20	12
BILATERAL, BELOW THE KNEE	2	1
TOTAL NUMBER OF PATIENTS	32	15
NUMBER OF PATIENTS TOTALLY REHABILITATED	17	6

One interesting point is that the death rate reported by Otteman within one month after surgery was 42 percent in the above-the-knee and 30 percent for below-the-knee amputations. Our figures were 28.5 and 12.6, respectively, to the site of the amputation. Lower figures of total deaths are cited by Thompson. They were 15.6 percent for above-the-knee and 6.4 percent for below-the-knee amputations.

As a final comment based upon our experience in reviewing the amputations in our hospital, it should be stated that amputation is a serious operative procedure for elderly patients, and they should be carefully selected after all other means of conservative and surgical measures to save the extremity are exhausted.

The importance of the right decision in regard to the level of amputation for the elderly should be emphasized, for in many patients it means the difference between walking and confinement to a wheelchair. The patient should also be prepared psychologically for the loss of his extremity. No amputee should be refused a prosthesis if he is physically capable of using it and professional training in its use is available.

Summary

A review is presented of the leg amputations, both above and below the knee, at Wayne County General Hospital, Eloise, Michigan, during the period from 1961 through 1965. The total number of amputations, their causes, and the death rate and causes of death are listed. Also included is information concerning the difference in these factors between the sexes, the total number of prostheses furnished, and the number of patients who were totally rehabilitated.

This work was supported by the Wayne County General Hospital research fund.

References

1. Olejniczak, Stanley, M.D. "Common Problems of the Aged in Physical Medicine and Rehabilitation in a County Hospital," *The Journal of the Michigan State Medical Society*, LX, 893-898, (July 1961).
2. Troedsson, Bror S. "Oscillometric Arterial Circulatory Norms," *JAMA*, CLXXII, 141-145, (January 1960).
3. D. Abramson. *Diagnosis and Treatment of Peripheral Vascular Disorders*. A. Hoeber-Harper Book, 1956, pp. 45-46.
4. Otteman, M. G., *et al.* "Evaluation of factors which Influence Mortality and Morbidity following Major Lower Extremity Amputations for Arteriosclerosis," *Surgery, Gynecology and Obstetrics*, CXX, 1217 (June 1965).
5. Thompson, R. C., Jr., *et al.* "Complications following Lower Extremity Amputations," *Surgery, Gynecology and Obstetrics*, CXX, 30104 (February 1965).

Evaluation of the Short Child

BY GEORGE E. BENSON, M.D.
ANN ARBOR

Accurate diagnosis of short stature in children may be difficult because of the multiple etiologies. The following discussion is an attempt to aid the physician in pursuing a rational course of investigation when confronted with such a problem.

Who requires evaluation?

The term dwarfism is arbitrarily applied to any child who is below the third percentile[1] (approximately −2 standard deviations) in height for his chronologic age. In general, diagnostic studies are indicated for patients in this category. This policy need not be strictly followed, however. For instance, many procedures may be deferred in a very young patient; evaluation will be facilitated at an older age, and the physician will have had an opportunity to observe the growth pattern. Observation may also be justified in the older child who is maintaining a steady growth rate near the third percentile, especially if family history of a similar growth pattern is obtained. However, even when extensive evaluation is deferred, it is imperative to rule out those conditions (e.g., hypothyroidism) in which a delay in treatment would be permanently harmful. In the majority of cases of short stature, however, immediate diagnosis is not critical from a therapeutic point of view.

Types of dwarfism

The major types of dwarfism in children are listed in Table I.

Dwarfism secondary to systemic disease (congenital heart disease, malabsorption, central nervous system disease, etc.) is usually diagnosed by the signs and symptoms of the primary defect. The exception is renal disease in which no abnormalities may be found on physical examination. There is, however, an association of congenital urinary tract defects with malformations of the external ear. In one series, 23 of 27 children with abnormal external ears were found to have urinary tract anomalies.[2]

Patients with primary skeletal abnormalities such as achondroplasia and metaphyseal dysostosis[3] can usually be recognized by the disproportionate shortness of the extremities relative to the head and trunk. Roentgenograms of the skull, hips, and

TABLE I

Major Types of Dwarfism

I. Systemic Disease (central nervous system, cardiac, pulmonary, gastro-intestinal, renal)

II. Primary Skeletal Abnormalities
  A. Chondrodystrophies (achondroplasia)
  B. Metaphyseal dysostoses
  C. Pseudo- and pseudo-pseudohypoparathyroidism

III. Primordial Dwarfism
  A. Without associated anomalies
  B. With associated anomalies

IV. Constitutional Delayed Growth and Adolescence (Delayed Maturation Syndrome)

V. Endocrinopathies
  A. Hypopituitarism
  B. Hypothyroidism

VI. Chromosomal Abnormalities
  A. Turner's syndrome

Doctor Benson is with the Department of Pediatrics, University of Michigan long bones will help to confirm the clinical impression. The disproportion in pseudohypoparathyroidism and in pseudo-pseudohypoparathyroidism is less marked, although shortening of the hands and feet is characteristic. Serum calcium is low and phosphorus high in the former condition, but chemistries are normal in the latter. Shortening of the metacarpals by x-ray is diagnostically helpful in either case.

Children with primordial dwarfism, constitutional delayed growth and adolescence (delayed maturation syndrome), and hypopituitarism present a more difficult diagnostic problem because obvious distinguishing physical features are often lacking. These patients have "proportional" short stature; that is, the extremities and trunk are equally small.

No obvious endocrine or metabolic abnormality can be found in primordial dwarfs. They remain small during childhood and do not attain normal adult height, although sexual development occurs at the usual time. Cases of this type may be sporadic or familial. Included in this group is the child of short parents, whose failure to attain the third percentile in height may be attributed to his genetic background (genetic dwarfism). The diagnosis of primordial dwarfism is strongly suggested in a patient with normal skeletal maturation and a history of low birth weight relative to gestational age[4] (intrauterine growth retardation).[5]* Confusion arises because some patients who apparently have primordial dwarfism are of normal size at birth,[6] and, furthermore, many will have a retarded bone age at least during early childhood.[6, 7] In such a case, differentiation from constitutional delayed growth may ultimately depend upon long-term observation.

Although some primordial dwarfs are normal in every aspect except size, many have associated congenital anomalies. These patients can usually be identified as belonging to one of a number of well-described syndromes.[7-13] Many of these conditions are characterized by microcephaly and mental retardation and may represent variants of the same basic defect. Attaching the proper eponym to the patient is not as important as recognizing that these children belong to the major group of primordial dwarfism with associated defects and usually carry a poor prognosis in regard to growth potential.

Patients with constitutional delayed growth are usually of normal size at birth, but fall behind their contemporaries during the first few years of life. Skeletal maturation conforms more closely to height age. In the typical case a steady growth rate is maintained, although height remains below the third percentile during childhood. Sexual maturation is also delayed. The prognosis is generally good, however, since these patients are likely to have a prolonged growth period and eventually attain a satisfactory adult height.

Hypopituitary dwarfism may be difficult to differentiate from constitutional delayed growth. Some children originally diagnosed as hypopituitary dwarfs subsequently prove to be cases of constitutional delay.[14] It is now thought that hypopituitarism is one of the rarer causes of dwarfism, accounting for roughly 5 percent or less of the children with small stature.[14, 15]

These patients have normal birth weight, but growth rate tends to plateau early in life. Bone age is usually equal to or less than height age. Since deficiency of target gland hormones can rarely be demonstrated in the resting state, diagnosis depends on more elaborate studies such as the metopirone test[16, 17] or plasma human growth hormone (HGH) assay.[18]

The metopirone test lends itself to wide usage, but a normal response depends upon the presence of adrenocorticotropin (ACTH) rather than growth hormone. It is assumed that ACTH insufficiency will usually be associated with low levels of HGH. Cases in which there is an isolated deficiency of HGH, however, will not be detected by this test. The frequency with which isolated HGH deficiency occurs is not known, but it is probably the exception rather than the rule.[14] The growth hormone assay is complex and is being performed primarily in clinical research in relatively few medical centers. Both the metopirone test and the HGH assay have been recently developed, and difficulties involving proper interpretation of results still exist. In many cases the diagnosis of hypopituitary dwarfism must, therefore, be made on a tentative basis.

Hypothyroidism often is easily recognized by the characteristic facies, decreased reflex activity, and infantile skeletal proportions. In some cases, however, the changes may be much more subtle. Bone age usually is markedly retarded.[6] Diagnosis may be confirmed by protein-bound iodine (PBI) determination. More elaborate tests of thyroid function are rarely necessary for correct diagnosis. The physician should not overlook the possibility of

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* *Low birth weight infants are called premature if the gestation was abnormally short. The term intrauterine growth retardation (IUGR) is applied if the gestation was of normal duration. Many, but not all, children with IUGR are short as adults, a type of primordial dwarfism. The prognosis for ultimate height in prematurity is somewhat better.*

TABLE II
Features of Various Types of Dwarfism

Disease	Physical Examination	Laboratory Data	Comment
I. Systemic Disease	Usually recognized by characteristic features of primary defect.	Depends on organ system involved.	Physical examination may be normal in renal disease.
II. Primary Bony Abnormalities			
1. Chondrodystrophy and metaphyseal dysostoses	Disproportionate skeletal configuration.	X-rays of skull, hips, and long bones.	
2. Pseudo and pseudo-pseudohypoparathyroidism	Short hands and feet.	Serum Ca and P. X-rays of long bones.	
III. Primordial Dwarfism			
1. Without congenital defects	Proportional skeletal configuration.	Bone-age films (usually normal).	Normal sexual development.
2. With congenital defects	Usually proportional, but with associated anomalies.	Bone-age films (usually normal).	Frequent microcephaly and mental retardation. Many syndromes described.
IV. Constitutional Delayed Growth	Proportional skeletal configuration.	Bone-age films (retarded).	
V. Endocrinopathies			
1. Hypopituitarism	Proportional skeletal configuration.	Bone-age films (retarded). Metopirone test, growth hormone assay.	May be difficult to differentiate from constitutional delay.
2. Hypothyroidism	Characteristic facies, dry skin, decreased reflexes. May have infantile skeletal configuration.	Bone-age films (retarded). PBI.	
VI. Chromosomal Abnormalities			
1. Turner's syndrome	Micrognathia, Webbed neck, broad chest, etc.	Buccal Smear, chromosome count.	Short stature may be the only obvious abnormality.

hypothyroidism in any child of small stature. No disorder of growth is more easily treated, and delay in therapy may be deleterious.

A diagnosis of Turner's syndrome[19] can readily be made in the most stigmatized children with micrognathia, webbed neck, broad chest, coarctation of the aorta, and a history of edematous hands and feet at birth. However, these associated abnormalities are not always obvious, and height may be near the normal range during early childhood. The correct diagnosis is, therefore, sometimes overlooked until puberty, when the expected adolescent changes fail to occur. Skeletal maturation is usually delayed by one or two years. A buccal smear showing a negative (male) chromatin pattern is presumptive evidence of this condition, but patients with mosaicism (e.g. XO/XX) will not always be detected by this procedure. A chromosome count provides confirmation of the diagnosis. Abnormalities compatible with Turner's syndrome may also occur in the male,[20] but diagnosis is based entirely on clinical recognition since the chromosome complement is invariably normal.

The preceding discussion is summarized in Table II.

Scheme of evaluation.

Inspection and physical examination will generally suggest a tentative diagnosis of systemic disease, bony disorders with disproportionate skeletal configuration, and primordial dwarfism with associated congenital defects. Appropriate confirmatory studies can then be obtained as suggested in Table II.

More difficulty is encountered in differentiating the various forms of proportional dwarfism. Confronted with such a situation, it is suggested that roentgenograms of skull, chest, and wrists for bone age be obtained. Blood chemistries should include PBI and blood-urea nitrogen, although renal disease as a cause of short stature is unlikely if the patient is able to produce concentrated urine.[21] The degree of skeletal maturation may help to differentiate between primordial dwarfism on the one hand and constitutional delay or hypopituitarism on the other. If the bone age is normal or slightly delayed, buccal smear is indicated in females, since the usual stigmata of Turner's syndrome need not be present. If normal, a diagnosis of primordial dwarfism is justified. If retarded skeletal maturation is found and PBI is normal, the metopirone test should be performed. This usually requires hospitalization for collection of 24-hour specimens. Growth hormone assay is helpful if available. Other studies, such as the speed with which serum-free fatty acids return to normal following insulin stimulation,[22] are presently being developed, but are not in general use. Low growth-hormone levels and lack of 17-hydroxysteroid elevation in response to metopirone suggest the diagnosis of hypopituitarism. Normal values are found in constitutional delay.

This diagnostic scheme is presented diagrammatically in Table III.

Comment:

It will be noted that many diseases associated with short stature have not been specifically mentioned. These include skeletal abnormalities such as rickets and osteogenesis imperfecta, inborn errors of metabolism such as Hurler's disease, Morquio's disease, and the aminoacidurias, and chromosomal

TABLE III

Suggested Preliminary Laboratory Studies In The Child With Proportional Dwarfism and No Other Obvious Abnormality

1. PBI 2. BUN 3. X-rays A. Skull B. Chest	If *abnormal,* appropriate tentative diagnosis is made.
C. Hands and wrists	1. *Bone age normal*: probable primordial dwarfism, but buccal smear should be done in female to rule out Turner's syndrome.
	2. *Bone age retarded* (but PBI normal) : do Metopirone test and HGH assay. If *normal,* probable constitutional delayed growth. If *abnormal,* probable hypopituitarism.
	3. Note: Abnormalities suggestive of Turner's syndrome, pseudohypoparathyroidism, metaphyseal dysostoses, etc., may also be detected on films of the hands and wrists.

abnormalities such as the trisomies. They were omitted because in most cases the associated defects are sufficiently prominent that growth failure is not the chief complaint.

The evaluation of the short child as suggested by the preceding discussion will not always yield a completely satisfactory diagnosis. Laboratory results may be difficult to interpret and occasionally appear to be incompatible with the clinical picture. Even such a valuable study as the determination of skeletal maturation is subject to a rather wide, normal-standard deviation: approximately six months at age three years, increasing to one year after age 10.[23] Nevertheless, judicious use of history, physical examination, and a few laboratory studies will usually define at least the major diagnostic category to which a dwarfed child belongs.

References

1. Reed, R. B., and Stuart, H. C. Patterns of Growth in Height and Weight from Birth to Eighteen Years of Age, *Pediatrics,* XXIV, 904 (1959).
2. Hilson, D. Malformation of Ears as Sign of Malformation of Genito-Urinary Tract. *British Medical Journal,* II, 785 (1957).
3. Koslowski, K. Metaphyseal Dysostosis. *American Journal of Roentgenology, Radium Therapy and Nuclear Medicine,* XCI, 602 (1964).
4. Wilkins, L. "Influence of the Endocrine Glands upon Growth and Development," *Textbook of Endocrinology,* ed. R. H. Williams, 3rd ed. (Philadelphia, 1962), p. 908.
5. Warkany, J., Monroe, B. B., and Sutherland, B. S. Intrauterine Growth Retardation. *American Journal of Diseases of Children,* CII, 249 (1961).
6. Mellman, J. W., Bongiovanni, A. M., and Hope, J. W. The Diagnostic Usefulness of Skeletal Maturation in an Endocrine Clinic. *Pediatrics,* XXIII, 530 (1959).
7. Seckel, H. P. G. *Bird-Headed Dwarfs: Studies in Developmental Anthropology Including Human Proportions* (Springfield, Charles C. Thomas), 1960.
8. Kallo, A., Lakatos, I., and Szijarto, L. Leprechaunism (Donohue's Syndrome), *Journal of Pediatrics,* LXVI, 372 (1965).
9. Szalay, G. C. Dwarfism with Skin Manifestations, *Journal of Pediatrics,* LXII, 686 (1963).
10. Jervis, G. A., and Stimson, C. W. DeLange Syndrome, *Journal of Pediatrics,* LXIII, 634 (1963).
11. Szalay, G. C. Pseudohydrocephalus in Dwarfs: The Russell Dwarf, *Journal of Pediatrics,* LXIII, 622, (1963).
12. Szalay, G. C. Intrauterine Growth Retardation versus Silver's Syndrome, *Journal of Pediatrics,* LXIV, 234 (1964).
13. Spark, H. Cachetic Dwarfism Resembling the Cockayne-Neill Type, *Journal of Pediatrics,* LXVI, 41 (1965).
14. Kaplan, S. A. Growth Hormone, *American Journal of Diseases of Children,* CX, 232 (1965).
15. Martin, M. D., and Wilkins, L. Pituitary Dwarfism: Diagnosis and Treatment, *Journal of Clinical Endocrinology and Metabolism,* XVIII, 679 (1958).
16. Liddle, G. W., Estep, H. L., Kendall, J. W., Williams, W. C., Jr., and Townes, A. W. Clinical Application of a New Test of Pituitary Reserve, *Journal of Clinical Endocrinology and Metabolism,* XIX, 875 (1959).
17. Richmond, L., Chappell, J., and Cleveland, W. W. Response of Children to Methopyrapone (Metopirone), *Journal of Pediatrics,* LXIV, 381 (1964).
18. Glick, S. M., Roth, J., Yalow, R. S., and Berson, S. A. Immunoassay of Growth Hormone in Plasma, *Nature,* CIC, 784 (1963).
19. Grumbach, M. M., VanWyck, J. D., and Wilkins, L. Chromosomal Sex in Gonadal Dysgenesis: Relationship to Male Pseudohermaphroditism and Theories of Human Sex Differentiation, *Journal of Clinical Endocrinology and Metabolism,* XV, 1161 (1955).
20. Steiker, D. D., Mellman, W. J., Bongiovanni, A. M., Eberlein, W. R., and Leboeuf, G. Turner's Syndrome in Males, *Journal of Pediatrics,* LVIII, 321 (1961).
21. West, C. D., and Smith, W. C. An Attempt to Elucidate the Cause of Growth Retardation in Renal Disease, *American Journal of Diseases of Children,* XCI, 460 (1956).
22. Landon, J., Greenwood, F. C., Stamp, T. C. B., and Wynn, V. The Plasma Sugar, Free Fatty Acid, Cortisol, and Growth Hormone Response to Insulin, and the Comparison of this Procedure with Other Tests of Adrenal Function. II. In Patients with Hypothalamic or Pituitary Dysfunction or Anorexia Nervosa, *Journal of Clinical Investigation,* VLV, 437 (1966).
23. Greulich, W. W., and Pyle, S. I. *Radiographic Skeletal Development of the Hand and Wrist,* 2nd ed. (Stanford, 1959).

SCIENTIFIC ARTICLE

A Simple Device For Artificial Ventilation in the Resuscitation of Newborn Infants

BY SAMUEL I. LERMAN, M.D.
DETROIT

Frequently when an infant does not breathe immediately after birth, it is necessary to force air under gentle pressure into its lungs. The causes of this delay in breathing may include depression of the respiratory center by pain-relieving drugs given to the mother or by anoxia due to prolonged and difficult delivery; prematurity may contribute to the problem, and some abnormal lung conditions also may interfere with expansion.

There are available a number of resuscitators, expensive and complicated mechanical devices, which intermittently force air into the infant's lungs. All too frequently, from lack of constant use, one may be unfamilar with the complicated controls of these devices, or they may be out of service, and the obstetrician will frequently resort to mouth-to-mouth breathing to force air into the infant's lungs.

I wish to describe a simpler, more acceptable technique for such artificial ventilation. Among the equipment usually present on the delivery room table is a rubber bulb syringe, commonly known as an ear and ulcer syringe, intended for the aspiration of fluid and mucus from the mouth and nostrils of the newborn infant. This can be applied to one nostril while the mouth and the other nostril are held shut. On squeezing the bulb, air is then forced through the nostril into the infant's pharynx and will distend the lungs, though ocassionally some may be forced down the esophagus into the stomach. The lips act as a safety valve so that if the pressue is too great, air will be forced through the lips, preventing the lungs from being over-distended. Within 20 seconds after inflating the lungs in such a manner, the cyanosis of an apoeic infant will usually improve. This maneuver can be repeated as desired until the infant begins spontaneous breathing.

If one wishes to ventilate the newborn baby with pure oxygen, a similar procedure can easily be done. A small flexible cathether can be connected to a source delivering oxygen at a flow of about 3 liters per minute. This cathether can be inserted into one nostril, or if it does not fit, it may be inserted into the mouth. By blocking the mouth and nostrils for one second at a flow of 3 liters per minute, a calculated 50 cubic cm of oxygen will be forced into the lungs (or stomach) and by intermittently releasing and blocking the outflow of gas from the nose and mouth, rhythmic ventilation can be carried out. Again, a safety-valve effect is provided by the lips so that this procedure is safer than direct ventilation through an endotracheal catheter. I have used these two procedures a number of times in the delivery room with very satisfactory results.

Doctor Lerman is associated with the Livernois Clinic, Detroit.

Youthful visitors to Disneyland's 19th-century Apothecary Shop are intrigued by a weird array of symbols — part of an exhibit there by the Upjohn Company to trace the course of pharmaceutical history through ages. The pharmacist's familiar "Rx" (left), shown in its original form, is a Latin symbol meaning "to take." Other symbols designate earth substances believed to possess curative powers.

MDPH Offers ASO Test

BY MICHIGAN DEPARTMENT
OF PUBLIC HEALTH

The Bureau of Laboratories, Michigan Department of Public Health, now offers antistreptolysin O test to assist in the diagnosis of rheumatic fever. This test can be valuable as supporting evidence of a recent streptococcal infection. The following excerpt from *Jones Criteria (Revised) for Guidance in the Diagnosis of Rheumatic Fever,* distributed by the American Heart Association, serves as a guide for using the test.

"The diagnosis of acute rheumatic fever should never be made solely on the basis of laboratory findings plus minor clinical manifestations. On the other hand, since laboratory indications of recent streptococcal infection and current inflammation occur so regularly with this disease, their unexplained absence should make the physician question the diagnosis of rheumatic fever.

Streptococcal Antibody Tests

"The most reliable evidence of a specific infection capable of producing acute rheumatic fever is an increased or, even better, a rising streptococcal antibody titer. These titers differentiate preceding streptococcal from other acute respiratory infections and are increased following asymptomatic as well as symptomatic infections.

"These antibody levels are generally increased in the early stages of acute rheumatic fever, but may be declining, or low, if the interval from the acute streptococcal infection to the detection of rheumatic fever has been longer than two months. This occurs most often in patients whose presenting rheumatic manifestation is chorea. Also, patients whose only major manifestation is rheumatic carditis may have low antibody titers when first seen. Their rheumatic attack may have been in progress several months before becoming symptomatic and thus recognized. Except in the latter two instances, one should be reluctant to make the diagnosis of acute rheumatic fever in the absence of serological evidence of a recent streptococcal infection.

"The antistreptolysin O test (ASO) is the most widely used and best standardized streptococcal antibody test. In general, single titers of at least 250 Todd units in adults and at least 333 units in children over five years of age are considered to be increased. Depending on the general prevalence of streptococcal infections, a varying per cent of the normal population may show titers of this magnitude.

"About 20 per cent of patients in the early stages of acute rheumatic fever, and most patients who present with chorea, have a low or borderline ASO titer. In these instances, it is advisable to obtain another streptococcal antibody test. When two or more different streptococcal antibody tests are performed, it is possible to show an increased titer in almost all cases of acute rheumatic fever within the first two months of onset, and in about half the cases presenting with chorea. Antibody determinations on serum samples obtained at two week intervals, preferably performed at the same time, are very useful in documenting a streptococcal infection, especially in patients with very low pre-infection titers. A rise in titer of two dilution tubes or more can be demonstrated for at least one of the streptococcal antibodies in almost all recurrent, as well as primary, attacks of rheumatic fever."

Blood or preferably serum should be submitted to the laboratory in Lansing or to one of the branch laboratories in Grand Rapids, Powers, or Houghton, depending on the laboratory serving the area. The unit 20 specimen container should be used for submitting specimens. Specify the ASO test on the blank. Sera submitted will be saved for four weeks in case a second specimen is submitted. The blank accompanying such sera should be marked ASO, second specimen, so that both sera may be tested together.

It is hoped that this service will help diagnose rheumatic fever, which frequently represents difficult diagnostic problems.

SYNTEX ERECTS NEW CALIFORNIA BUILDING

Syntex has dedicated $13 million to research, production, and administrative facilities at Palo Alto, California.

Included is a new manufacturing building that for the first time gives the company its own pharmaceutical production capability in the United States.

Formerly, Syntex leased manufacturing space from a pharmaceutical firm in Morris Plains, New Jersey. The firm began in Mexico City in 1944.

Breakdown by Specialties in Each Michigan County

The information on these two pages is from an AMA booklet, **Distribution of Physicians, Hospitals and Hospital Beds in the United States.** The booklet — with many other facts — is available for $1.00 from the AMA, 535 N. Dearborn, Chicago.

STATE COUNTY	County Group	Number of Hospitals	Number of Hospital Beds	Resident Population	Income Per Capita	Income Per Household
		March 1, 1966	March 1, 1966	January 1, 1965	1964	1964
MICHIGAN		189	28,405	8,259,700	$2,359	$ 8,271
ALCONA	5	0	0	6,200	$1,557	$ 5,364
ALGER	4	1	35	9,000	$1,549	$ 5,575
ALLEGAN	3	3	162	58,400	$1,959	$ 6,893
ALPENA	4	1	181	30,000	$1,830	$ 6,695
ANTRIM	5	0	0	10,500	$1,543	$ 5,062
ARENAC	3	1	22	9,600	$1,610	$ 5,520
BARAGA	5	1	70	7,300	$1,571	$ 5,462
BARRY	3	1	81	30,000	$2,098	$ 7,072
BAY	2	3	602	111,000	$2,081	$ 7,404
BENZIE	5	1	43	7,900	$1,662	$ 5,253
BERRIEN	3	4	456	160,200	$2,326	$ 7,878
BRANCH	3	1	137	35,300	$2,223	$ 7,848
CALHOUN	3	4	531	147,000	$2,399	$ 8,107
CASS	3	1	54	38,200	$1,955	$ 6,667
CHARLEVOIX	4	1	44	14,100	$1,682	$ 5,648
CHEBOYGAN	4	1	77	14,200	$1,526	$ 5,419
CHIPPEWA	4	1	228	36,700	$1,715	$ 6,171
CLARE	5	0	0	12,500	$1,522	$ 5,006
CLINTON	2	1	87	43,200	$1,864	$ 6,823
CRAWFORD	5	1	50	5,400	$1,601	$ 5,763
DELTA	4	1	143	34,600	$1,736	$ 6,007
DICKINSON	4	1	168	24,300	$1,833	$ 5,786
EATON	2	2	97	53,200	$2,157	$ 7,551
EMMET	4	2	204	16,100	$1,712	$ 5,741
GENESEE	2	4	1,492	412,000	$2,256	$ 8,054
GLADWIN	3	1	35	10,500	$1,521	$ 5,151
GOGEBIC	4	2	147	23,000	$1,630	$ 5,135
GRAND TRAVERSE	4	1	249	35,800	$2,155	$ 7,873
GRATIOT	3	1	119	38,000	$1,988	$ 6,994
HILLSDALE	3	1	102	34,200	$1,972	$ 6,678
HOUGHTON	4	2	207	34,600	$1,726	$ 5,687
HURON	4	3	115	34,500	$1,598	$ 5,685
INGHAM	2	3	732	227,300	$2,532	$ 8,800
IONIA	3	1	66	44,600	$1,875	$ 6,971
IOSCO	5	1	38	22,300	$1,865	$ 6,300
IRON	4	2	49	16,800	$1,815	$ 5,863
ISABELLA	4	1	110	36,500	$1,926	$ 7,812
JACKSON	2	2	478	137,400	$2,446	$ 8,638
KALAMAZOO	2	3	673	180,200	$2,563	$ 9,057
KALKASKA	5	1	16	4,400	$1,586	$ 5,368
KENT	2	4	1,349	387,000	$2,460	$ 8,388
KEWEENAW	5	0	0	2,400	$1,589	$ 4,768
LAKE	5	0	0	5,300	$1,448	$ 4,264
LAPEER	2	2	185	44,100	$1,958	$ 7,643
LEELANAU	5	1	27	9,800	$1,619	$ 5,472
LENAWEE	3	4	320	78,000	$2,031	$ 7,135
LIVINGSTON	3	1	141	41,100	$2,077	$ 7,422
LUCE	4	1	32	7,500	$1,968	$ 9,224
MACKINAC	4	0	0	11,100	$1,636	$ 6,054
MACOMB	1	4	469	502,700	$2,245	$ 8,538
MANISTEE	4	1	58	19,500	$1,903	$ 6,085
MARQUETTE	4	3	370	61,000	$1,790	$ 6,423
MASON	4	1	61	22,000	$1,834	$ 5,934
MECOSTA	4	1	60	21,900	$1,681	$ 6,239
MENOMINEE	4	1	132	24,400	$1,578	$ 5,423
MIDLAND	3	1	224	56,400	$2,277	$ 8,619
MISSAUKEE	5	0	0	6,400	$1,427	$ 5,072
MONROE	2	2	191	109,800	$2,006	$ 7,343
MONTCALM	3	2	101	38,000	$1,783	$ 5,842
MONTMORENCY	5	0	0	4,300	$1,423	$ 4,706
MUSKEGON	2	2	428	160,300	$2,107	$ 7,456
NEWAYGO	3	2	87	25,400	$1,725	$ 5,921
OAKLAND	1	5	1,031	758,700	$2,955	$10,792
OCEANA	3	2	62	16,600	$1,734	$ 5,998
OGEMAW	5	1	54	9,300	$1,555	$ 5,164
ONTONAGON	5	2	57	11,100	$1,564	$ 5,423
OSCEOLA	5	1	49	13,700	$1,681	$ 5,759
OSCODA	5	0	0	3,700	$1,732	$ 5,341
OTSEGO	4	1	31	8,600	$1,586	$ 5,683
OTTAWA	2	3	237	106,400	$2,128	$ 7,674
PRESQUE ISLE	4	2	75	13,200	$1,748	$ 6,410
ROSCOMMON	5	0	0	7,500	$1,860	$ 5,580
SAGINAW	2	3	781	200,300	$2,164	$ 7,823
ST CLAIR	3	3	355	111,400	$2,015	$ 6,907
ST JOSEPH	3	2	174	43,000	$2,210	$ 7,092
SANILAC	3	2	62	33,200	$1,699	$ 5,755
SCHOOLCRAFT	4	1	55	8,400	$1,503	$ 5,051
SHIAWASSEE	3	2	211	56,000	$2,110	$ 7,339
TUSCOLA	3	2	90	44,400	$1,858	$ 6,761
VAN BUREN	3	2	122	51,600	$1,988	$ 6,492
WASHTENAW	2	4	1,633	190,000	$2,836	$10,321
WAYNE	1	55	10,864	2,708,500	$2,520	$ 8,619
WEXFORD	4	1	127	18,700	$1,822	$ 6,195

Breakdown of Hospitals and Population for Each County

STATE COUNTY	Total Number of Physicians	Total In Private Practice	Selected Specialties in Private Practice					
			General Practice	General Surgery	Internal Medicine	Obstetrics Gynecology	Pediatrics	Psychiatry
	JANUARY 3, 1966							
MICHIGAN	10,050	6,350	2,208	710	733	549	330	303
ALCONA	1	1	1	0	0	0	0	0
ALGER	4	3	3	0	0	0	0	0
ALLEGAN	30	27	20	3	0	1	0	1
ALPENA	24	20	9	2	2	3	1	0
ANTRIM	6	4	4	0	0	0	0	0
ARENAC	5	4	3	1	0	0	0	0
BARAGA	3	3	2	0	0	0	0	0
BARRY	18	15	8	3	0	2	0	0
BAY	89	88	33	8	6	4	5	3
BENZIE	4	4	4	0	0	0	0	0
BERRIEN	121	106	41	14	8	10	6	2
BRANCH	27	23	7	4	3	2	2	1
CALHOUN	131	113	36	15	12	6	5	4
CASS	14	11	10	1	0	0	0	0
CHARLEVOIX	14	9	7	0	0	0	0	0
CHEBOYGAN	9	6	6	0	0	0	0	0
CHIPPEWA	21	19	10	3	3	0	0	0
CLARE	5	5	4	0	0	0	0	0
CLINTON	14	13	12	1	0	0	0	0
CRAWFORD	5	4	2	2	0	0	0	0
DELTA	24	19	11	2	0	1	1	0
DICKINSON	21	15	11	2	0	0	0	0
EATON	24	20	18	1	0	1	0	0
EMMET	33	33	6	3	7	3	2	0
GENESEE	446	309	112	33	33	24	16	7
GLADWIN	4	4	3	1	0	0	0	0
GOGEBIC	12	12	11	0	0	0	0	0
GRAND TRAVERSE	90	50	13	4	8	2	3	1
GRATIOT	25	24	16	2	2	1	0	0
HILLSDALE	17	16	14	1	1	0	0	0
HOUGHTON	23	20	13	1	0	0	0	1
HURON	21	20	16	2	1	1	0	0
INGHAM	308	225	76	17	20	18	11	9
IONIA	24	17	14	2	0	0	0	0
IOSCO	10	9	8	0	0	0	0	1
IRON	10	8	7	1	0	0	0	0
ISABELLA	28	24	7	5	3	2	2	0
JACKSON	125	108	44	8	12	7	6	3
KALAMAZOO	284	184	52	22	22	16	13	8
KALKASKA	4	3	3	0	0	0	0	0
KENT	529	389	81	62	53	39	25	14
KEWEENAW	0	0	0	0	0	0	0	0
LAKE	2	2	2	0	0	0	0	0
LAPEER	30	17	8	4	0	2	0	2
LEELANAU	3	3	3	0	0	0	0	0
LENAWEE	60	54	36	3	3	3	2	0
LIVINGSTON	30	21	18	1	0	0	0	0
LUCE	11	4	3	1	0	0	0	0
MACKINAC	8	4	4	0	0	0	0	0
MACOMB	225	189	72	18	22	29	14	4
MANISTEE	14	11	4	2	2	2	1	0
MARQUETTE	52	43	18	4	4	3	2	0
MASON	18	15	12	1	1	0	1	0
MECOSTA	12	10	8	2	0	0	0	0
MENOMINEE	10	9	5	0	0	0	0	0
MIDLAND	64	42	12	5	5	6	3	2
MISSAUKEE	2	2	2	0	0	0	0	0
MONROE	45	39	23	5	2	1	1	1
MONTCALM	23	21	15	3	1	0	0	0
MONTMORENCY	1	1	1	0	0	0	0	0
MUSKEGON	130	113	34	13	11	10	4	4
NEWAYGO	15	13	10	0	1	0	1	0
OAKLAND	945	686	137	74	96	81	58	57
OCEANA	9	9	9	0	0	0	0	0
OGEMAW	11	9	5	1	0	0	1	0
ONTONAGON	6	6	6	0	0	0	0	0
OSCEOLA	5	5	5	0	0	0	0	0
OSCODA	2	1	1	0	0	0	0	0
OTSEGO	8	5	4	0	0	0	0	0
OTTAWA	79	69	45	6	3	3	3	0
PRESQUE ISLE	5	5	2	1	0	2	0	0
ROSCOMMON	6	4	3	0	0	0	0	0
SAGINAW	209	154	59	10	11	13	8	3
ST CLAIR	85	76	30	10	7	7	4	0
ST JOSEPH	27	24	22	0	0	0	0	0
SANILAC	16	15	13	0	0	0	0	0
SCHOOLCRAFT	5	5	5	0	0	0	0	0
SHIAWASSEE	33	30	12	4	7	2	1	0
TUSCOLA	20	13	12	0	1	0	0	0
VAN BUREN	36	29	26	2	0	0	0	0
WASHTENAW	1,017	224	51	21	24	18	13	35
WAYNE	4,147	2,367	707	292	335	223	113	140
WEXFORD	17	14	6	1	1	1	2	0

WSU Medical School Alumni, What They Are Doing Now:

(The following excerpts are from the annual 1966-67 report by John M. Pendy, M.D., WSU Medical Alumni Association President)

"Wayne State University now ranks as the eighteenth largest university in the nation and it traces its beginning to the School of Medicine. We have a proud heritage and the men who have been graduated from the School of Medicine since its inception in 1868 have enhanced this tradition.

"The School has exercised a wide influence, through its Alumni, not only in Michigan but in the medical field throughout the country. As the accompanying map indicates, we have Alumni in every state and in 17 countries as well. A number of the WSU graduates are located outside United States in missionary posts and with the Peace Corps in underprivilegel countries. Certainly their service to mankind is a source of pride to all of us.

"WSU graduates are contributing their skills and knowledge in many areas of medicine. Of the total Alumni body of 2,940, almost 300 are on the faculties of this and other medical schools, engaged in teaching the nation's future physicians. Several are full Professors and Heads of their Departments.

"A number of the WSU graduates hold important positions in the medical departments of large industrial corporations. Others are engaged in research activities with drug firms, while still others are hospital administrators.

"Of course, many younger graduates are presently fulfilling their military obligations and are serving their country with distinction. A number of Alumni have chosen the military as a career and have risen to high ranks in all branches of the Service.

"The Public Health field has also been the choice of a number of graduates. Several are located with Branches of the National Institutes of Health, while others are working with state and

JOHN M. PENDY, M.D.

SPECIALTIES OF WSU ALUMNI

Administrative Medicine	37
Allergy	16
Anesthesiology	68
Aviation Medicine	3
Cardiovascular Disease	10
Child Psychiatry	12
Dermatology	35
Forensic Pathology	1
Gastroenterology	5
General Practice	839
General Surgery	236
Internal Medicine	293
Neurological Surgery	21
Neurology	8
Obstetrics & Gynecology	225
Occupational Medicine	30
Ophthalmology	91
Orthopedic Surgery	55
Otolaryngology	46
Pathology	65
Pediatrics	100
Physical Medicine	6
Plastic Surgery	11
General Preventive Medicine	7
Colon & Rectal Surgery	5
Psychiatry	210
Public Health	11
Pulmonary Disease	8
Radiology	123
Therapeutic Radiology	1
Thoracic Surgery	13
Urology	59
Others not recognized	12
Unspecified, retired or specialty unknown	295

county health departments. We number among our living Alumni an Ex-Surgeon General of the Public Health Service.

"WSU graduates have been and are very active in various professional societies. Two hundred and forty-two are Fellows of the American College of Surgeons and 90 are Fellows of the American College of Physicians. We have representation on the Boards of many state and county medical societies and a number of our graduates have served as officers of these organizations.

"We are proud of our heritage and tradition, but your Alma Mater is also planning for an even greater and more illustrious future.

"WSU is singularly fortunate in having the richest sources for clinical teaching in the state of Michigan. Indeed, no other city of Detroit's size is served by a single medical school and this situation is further magnified by the fact that the metropolitan area now encompasses three counties: Wayne, Oakland and Macomb, with a total population of 3,918,000.

"Medical research at Wayne is supported by nearly five million dollars in annual grants. Projects under way include studies of growth and disease before birth, disorders of the ear, infectious diseases, arthritis and rheumatic disorders, cancer, skin disorders and stroke.

"As far as the physical plant is concerned, we are excited over plans for the future which include a new Basic Science Building, a new medical library, a conference center, an outpatient clinic capable of serving 450,000 patients a year, a vivarium and parking structures. When the new Basic Science building is completed, Wayne State will be prepared to enroll an entering class of 200 students, thus fulfilling its mandate to play its part in meeting the country's need for more physicians."

MSMAS Conference Next at Marquette; 150 Attend Seminar

More than 150 medical assistants attended the Tenth Annual Educational Seminar of the Michigan State Medical Assistants Society recently held in Jackson.

The Seminar, which had the theme 'Rx for Knowledge," featured Ross V. Taylor, M.D., Jackson, speaking on "Cardiology." Other principal speakers during the two-day conference were John R. Gosling, M.D., Ann Arbor, on "Gynecological Bleeding," and Donald H. Hulding, M.D., Jackson, on "Dermadromes."

THE MSMAS Upper Peninsula Summer Seminar will be held July 15-16 at the Northland Hotel in Marquette.

TO ENLARGE STATE REHABILITATION CENTER

Two million dollars from state and federal funds for a building project will permit an additional 150 physically handicapped Michigan men to receive extensive vocational training at the Michigan Rehabilitation Institute at Pine Lake, near Plainwell. The new classrooms, library, auditorium, and laboratories will give the center a capacity to serve a total of 450 men.

Ira Polley, Superintendent of Public Instruction, contends, "The many thousands of young men who will profit from this expanded program will be able to return to their communities as contributors to the economy of the state rather than as recipients of public assistance programs."

Suggests Changes In Health Personnel

Excerpts of an address by Robert B. Howard, M.D., Ph.D., Dean, University of Minnesota Medical School, at 1967 AMA Congress on Medical Education:

"We must devote not only attention but imagination to the development of still other kinds of health personnel. The concept of the 'assistant physician' deserves thoughtful consideration. I am among those rather skeptical about the future of such a profession or vocation in this country, but I do believe that it deserves to have careful scrutiny, free of the emotionalism that has so often characterized discussion of it as a possibility.

"I believe it more likely that we can develop skilled technicians in more specific and localized areas of medical activity. The anesthetic technician, the ophthalmic assistant, and the psychotherapist's aide are examples of products of programs that we ought to be able to develop and to offer as three-or-four-year post-high school programs. Midwifery should be re-examined and re-evaluated for its possible contribution to health care.

"We ought to be able to develop a program to train ward managers to oversee the administrative functions necessary for the operation of a hospital ward, freeing all too scarce nursing personnel of frankly managerial chores. Routine scanning of certain kinds of pathological slides and smears could be done, it seems to me, by individuels specifically trained for such a task without the long, arduous training of the certified pathologist.

"Finally, we must give thought to how these allied health professions can be made attractive to males, who will enter these fields with the expectation of making them lifetime vocations."

Discussion on a recent WJR Focus program between Frederick Margolis, M.D., right, Kalamazoo, and Commentator J. P. McCarthy centered on the educational movie, "A Parent to Child about Sex" produced by Doctor Margolis and Wayne State University Medical School. Doctor Margolis discussed the current MSMS efforts to improve family life education in the schools.

McGRAW-HILL ISSUES NEW FILM ABOUT VD

"VD: Epidemic" is the title of the new McGraw-Hill text-film available for use in school assemblies, PTA's, church meetings, etc., to help the medical profession in its current educational effort. (MSMS and the AMA are conducting public educational programs now.)

"This film will help students understand the biological facts of human reproduction, and to appreciate the psychological, emotional, and moral aspects of bringing a child into the world," says a McGraw-Hill official. The film commentary contends that "ignorance is a major cause of the spread of VD, which strikes more than 1,400,000 young Americans each year."

"Physicians have become increasingly concerned with their need for effective continuing educational opportunities in order that the advances in medical knowledge may be applied in practice with as little delay as possible."

—AMA Guide Regarding Objectives and Basic Principles of Continuing Medical Education Programs

MSMS ANNUAL SESSION, SEPT. 27-28-29

MSMS **ANNUAL** SESSION, SEPT. 27-28-29

MSMS ANNUAL **SESSION,** SEPT. 27-28-29

MSMS ANNUAL SESSION, **SEPT. 27-28-29**

House of Delegates, Sept. 24-25-26

The AMBAR SCRAPBOOK of Obesity Oddities
FACT & LEGEND

CHARLES DICKENS' "FAT BOY JOE" in Pickwick Papers
IS THE FIRST RECORDED CASE OF OBESITY WITH NARCOLEPSY
DR. C. SIDNEY BURWELL COINED THE TERM "PICKWICKIAN SYNDROME" IN 1955!

TAKE HEED
O GOOD TRAV'LLER
AND DO NOT
TREAD HARD
FOR HERE LIES
DR. STAFFORD
IN ALL THIS
CHURCH-YARD

Obese Epitaph
in English graveyard

RECORD FOR EATING
GOES TO MATTHEW DAKING AGED 12
WHO, IN 1743, CONSUMED 384 LBS. OF FOOD IN SIX DAYS!

THE Cost of AMBAR EXTENTABS
IS APPROXIMATELY ONE-HALF THAT OF OTHER LEADING APPETITE SUPPRESSANTS.
AN IMPORTANT FACTOR IN LONG-TERM THERAPY!

CONTROL FOOD AND MOOD ALL DAY LONG WITH A SINGLE MORNING DOSE

AMBAR #2
EXTENTABS®
methamphetamine HCl 15 mg., phenobarbital 64.8 mg. (1 gr.) (Warning: may be habit forming).

One Ambar Extentab before breakfast can help control most patients' appetite for up to 12 hours. Methamphetamine, the appetite suppressant, gently elevates mood and helps overcome dieting frustrations. Phenobarbital, the sedative in Ambar, controls irritability and anxiety...helps maintain a state of mental calm and equanimity. Both work together to ease the tensions that erode the willpower during periods of dieting.

Also available: Ambar #1 Extentabs®—methamphetamine hydrochloride 10 mg., phenobarbital 64.8 mg. (1 gr.) (Warning: may be habit forming).

BRIEF SUMMARY/**Indications:** Ambar suppresses appetite and helps offset emotional reactions to dieting. **Contraindications:** Hypersensitivity to barbiturates or sympathomimetics; patients with advanced renal or hepatic disease. **Precautions:** Administer with caution in the presence of cardiovascular disease or hypertension. **Side Effects:** Nervousness or excitement occasionally noted, but usually infrequent at recommended dosages. Slight drowsiness has been reported rarely. See package insert for further details.

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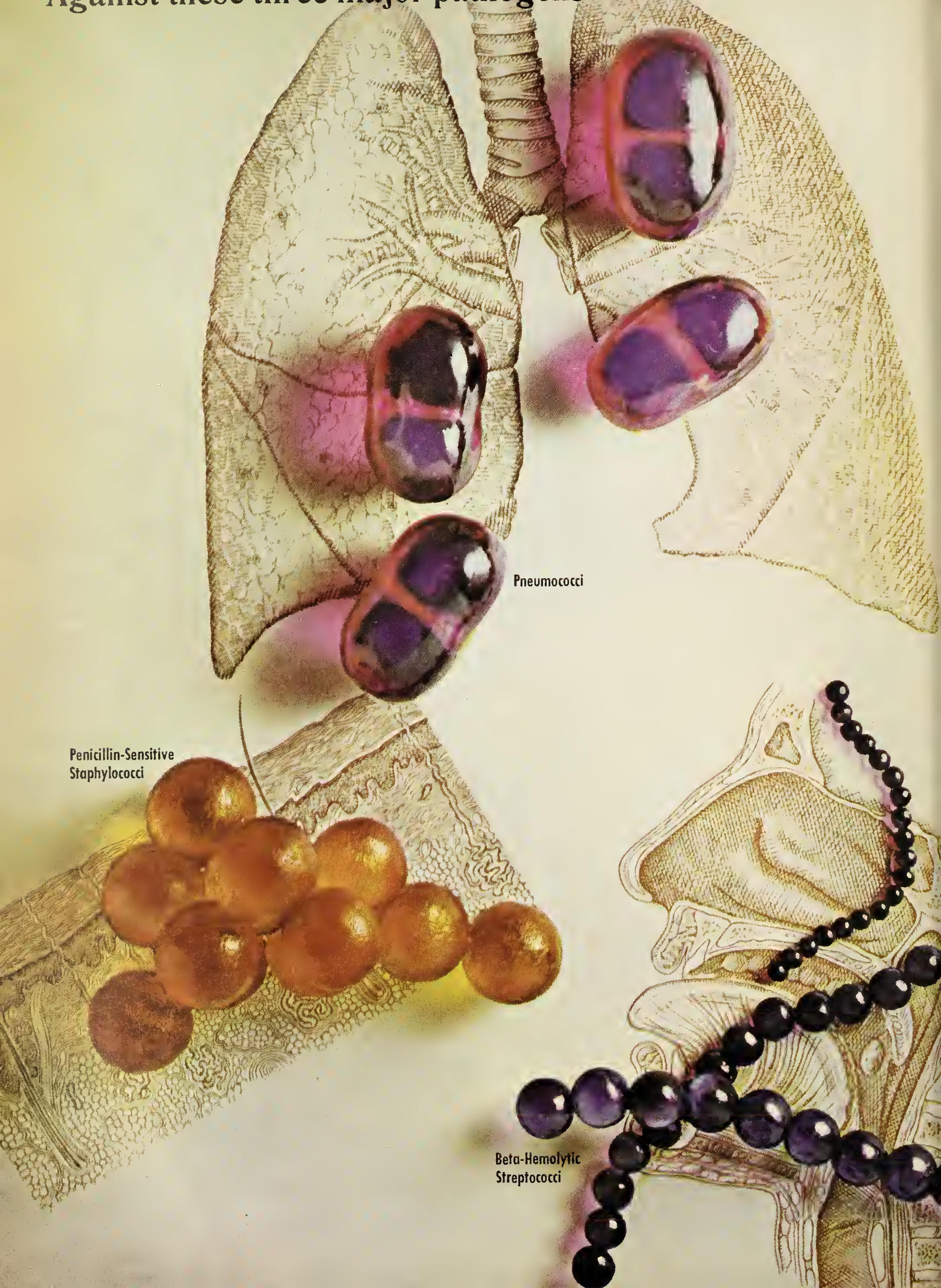
Against these three major pathogens…


Pneumococci
Penicillin-Sensitive Staphylococci
Beta-Hemolytic Streptococci

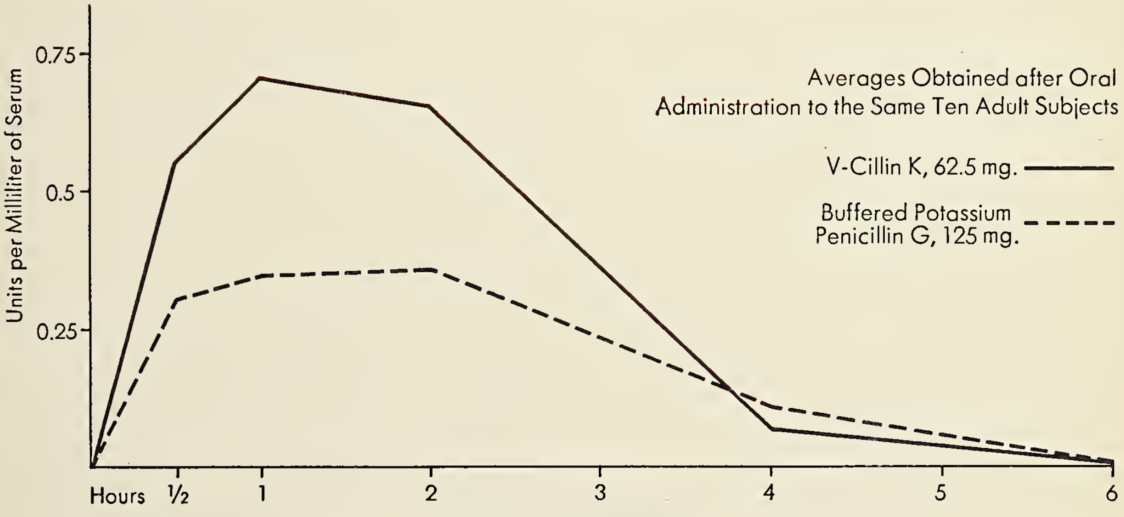
V-Cillin K® provides dependable oral antibacterial activity

because it combines a high degree of in-vitro activity...

Antibiotic	Staph.Aureus (Penicillin-Sensitive) MIC (mcg./ml.) Median	Range	Streptococcus, Group A MIC (mcg./ml.) Median	Range	Diplococcus Pneumoniae MIC (mcg./ml.) Median	Range
Penicillin V	0.02	0.02-0.04	0.02	0.003-0.4	0.01	0.005-0.2
Penicillin G	0.02	0.005-1.6	0.005	0.002-0.2	0.02	0.01-0.1
Methicillin	1.6	0.4-6.3	0.2	0.1-0.4	0.2	0.1-1.6
Oxacillin	0.4	0.1-3.1	0.04	0.02-0.4	0.1	0.04-0.8
Cloxacillin	0.2	0.2-0.8	0.1	0.1-0.8	—	—
Nafcillin	0.4	0.2-0.8	0.04	0.02-0.1	0.02	0.02-0.2
Ampicillin	0.2	0.1-0.8	0.02	0.01-0.04	0.02	0.01-0.04

Adapted from Klein, J. O., and Finland, M.: New England J. Med., 269:1019, 1963.

with high blood levels, even in the presence of food



Adapted from Griffith, R. S., and Block, H. R.: Current Ther. Res., 6:253, 1964.

V-Cillin K® Lilly 700636

Potassium Phenoxymethyl Penicillin

(See next page for prescribing informatio

New 500 mg. tablets...a more convenient way to give high doses

100 TABLETS No. 1832
℞ V-CILLIN K®
POTASSIUM PHENOXYMETHYL PENICILLIN TABLETS, U.S.P.
500 mg. (800,000 Units)
DATED
Lilly

Description: V-Cillin K is the potassium salt of V-Cillin® (phenoxymethyl penicillin, Lilly). This chemically improved form combines acid stability with immediate solubility and rapid absorption. Higher serum levels are obtained more rapidly with this penicillin than with equal oral doses of penicillin G. The higher serum levels and acid stability of V-Cillin K make it a more dependable penicillin for oral use.

V-Cillin K, Pediatric, is an oral solution of clinically proved V-Cillin K in teaspoon dosage form. When mixed as directed, each 5 cc. (approximately one teaspoonful) will contain 125 mg. (200,000 units) phenoxymethyl penicillin as the potassium salt.

Indications: V-Cillin K has been shown to be effective in the treatment of streptococcus, pneumococcus, and gonococcus infections as well as infections caused by sensitive strains of staphylococci. It may be used for the prophylaxis of streptococcus infections in patients with a history of rheumatic fever and for the prevention of bacterial endocarditis after tonsillectomy and tooth extraction in those patients with a history of rheumatic fever or congenital heart disease.

Contraindication: V-Cillin K should not be administered to a patient with o history of penicillin hypersensitivity.

Warnings: In rare instances, the use of penicillin may cause acute anaphylaxis which may prove fatal unless promptly controlled. This type of reaction appears more frequently in patients with a history of sensitivity reactions to penicillin and in those with bronchial asthma or other allergies. Resuscitative drugs should be readily available for emergency administration. These include epinephrine and pressor drugs (as well as oxygen for inhalation) for relief of immediate allergic manifestations and antihistamines and corticosteroids for delayed effects.

Precautions: V-Cillin K should be used cautiously, if at all, in a patient with a strongly positive history of allergy.

In prolonged therapy with penicillin, and particularly with high parenteral dosage schedules, frequent evaluation of the renal and hematopoietic systems is recommended.

In suspected staphylococcus infections, proper laboratory studies (including sensitivity tests) should be performed.

The use of penicillin may be associated with the overgrowth of pencillin-insensitive organisms. In such cases, its administration should be discontinued, and appropriate measures should be taken.

Adverse Reactions: Although serious allergic reactions are much less common with administration of oral penicillin than with intramuscular forms, manifestations of penicillin allergy may occur.

Penicillin is a substance of low toxicity, but it does possess a significant index of sensitization. The following hypersensitivity reactions associated with the use of penicillin have been reported: skin rashes ranging from maculopapular eruptions to exfoliative dermatitis; urticaria; and reactions resembling serum sickness, including chills, fever, edema, arthralgia, and prostration. Severe and often fatal anaphylaxis has occurred (see Warnings). Hemolytic anemia, leukopenia, thrombocytopenia, and nephropathy are rarely observed side-effects and are usually associated with high parenteral dosage.

Administration and Dosage: For Tablets V-Cillin K and for V-Cillin K, Pediatric, the usual dosage ranges from 125 mg. (200,000 units) three times a day to 500 mg. (800,000 units) every four hours. For infants, the daily dosage may be 50 mg. per Kg. of body weight divided into three doses.

Beta-hemolytic streptococcus infections without associated bacteremia may be treated with 200,000 to 400,0000 units three times a day. Therapy should be continued for a minimum of ten days to prevent development of rheumatic fever and/or other serious complications. Dosage for routine streptococcus prophylaxis in patients with a history of rheumatic fever or congenital heart disease may be 200,000 units once or twice daily. When such patients undergo tonsillectomy, tooth extraction, or other minor surgery, the prophylactic dose should be 500,000 units every six hours given two days prior to surgery and for two days postoperatively. If oral medication is not feasible on the day of surgery, parenteral therapy should be considered. Mild to moderately severe pneumococcus pneumonia has been treated effectively with 250 mg. every six hours.

In staphylococcus infections, 400,000 units or more should be given every six to eight hours in conjunction with indicated surgical procedures.

For gonorrhea in males, 500 mg. (800,000 units) every four hours for three doses may be employed; in females, 500 mg. every four hours for six doses are recommended. Refractory infections generally respond to a second treatment three to four days following completion of the first. Treatment of gonorrhea with severe complications should be individualized, with prolonged and intensive treatment. Patients with a suspected lesion of syphilis should have a dark-field examination before receiving penicillin and monthly serologic tests for a minimum of three months.

How Supplied: Tablets V-Cillin K, U.S.P., 125 mg. (200,000 units), in bottles of 50 and 100; and 250 mg. (400,0000 units) and 500 mg. (800,000 units), in bottles of 24 and 100.

V-Cillin K, Pediatric, for Oral Solution, 125 mg. (200,000 units) per 5 cc. of solution, in 40, 80, and 150-cc.-size packages. [032067]

Additional information available to physicians upon request. Eli Lilly and Company, Indianapolis, Indiana 46206.

Lilly

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Rabies (Skunks, Bats) in Michigan

BY MICHIGAN DEPARTMENT
OF PUBLIC HEALTH

In Michigan there has been no clinical case of rabies reported in humans since 1948. Nevertheless, the problem of human exposure to the rabies virus remains important owing to the continuing reservoir of the virus in animals. Today the disease in wildlife is most apparent in the skunk. In 1961 a new record of 54 laboratory-proven cases of rabies in skunks was established; last year there were 30 laboratory-proven cases.

SKUNKS

The continuing problem of rabies in skunks makes it important to improve control in rural and suburban areas where dogs and cats are most exposed to wildlife. It is illegal to capture wild skunks and keep them for pets, and veterinarians are prohibited by law from de-scenting skunks captured in Michigan. Fortunately, most humans avoid skunks, so they are not likely to be bitten by a rabid skunk. Dogs, however, do not avoid skunks, and so are likely to be bitten by a rabid one. Dogs, of course, live closer to man than any other animal, and this necessitates immunizing dogs against rabies. Immunization of dogs is the best way to break the chain of transmission from wildlife to man.

Currently 22 of our 83 counties are known to require rabies vaccination for dogs. Several other counties require immunization when rabies in dogs is prevalent, and they then drop the requirement when rabies cases cease. This increases enforcement problems and confuses the public. Needless to say, this practice is hardly encouraged.

BATS

In recent years rabies in bats has become increasingly significant as a potential source of human exposure. In fact, enough evidence has been accumulated to recommend that physicians consider *all* bat bites in humans as constituting exposure to rabies virus. *Twenty-four laboratory-proven* rabid bats have been found in Michigan to date. *Human exposure by bat bite occurred in every case.* These resulted from picking up moribund bats lying on the ground or on the basement floor of a house; almost all of these exposures were in children. It is impossible to appraise accurately the importance of the bat in the epidemiology of rabies. However, it appears that bats may well be nature's reservoir of the rabies virus.

TREATMENT

The treatment of humans possibly exposed to rabies poses a difficult problem. The fact that there has not been a human case of rabies in Michigan for almost twenty years; the fact that the bite of a rabid animal will cause human rabies only about two times out of ten; the fact that rodents, most frequently involved in human exposures, are least likely to be rabid; and the fact that rabies vaccines can cause deleterious reactions, all combine to create a complicated situation. The overriding fact, of course, is that clinical human rabies is always fatal. Thus, even with reasonably good odds against development of a clinical case, treatment is practically always recommended.

The following information on treatment of wounds involving possible exposure to rabies is taken from the 5th Report of the World Health Organization's Expert Committee on Rabies. A complete copy of the Report may be obtained from the Michigan Department of Public Health, Lansing.

(1) Recommended in all exposures

- (a) First-aid treatment
  Immediate washing and flushing with soap and water, detergent, or water alone (recommended procedure in all bite wounds including those unrelated to possible rabies exposure).
- (b) Treatment by or under direction of a physician
  - (i) Adequate cleansing of the wound.
  - (ii) Thorough treatment with 20% soap solution and/or the application of a quaternary ammonium compound or other substance of proven lethal effect on the rabies virus.[1]
  - (iii) Topical application of antirabies serum or its liquid or powered globulin preparation (optional).
  - (iv) Administration, where indicated, of antitetanus procedures and of antibiotics and drugs to control infections other than rabies.
  - (v) Suturing of wound not advised.

(2) Additional local treatment for severe exposures only

- (a) Topical application of antirabies serum or its liquid or powered globulin preparation.

(b) Infiltration of antirabies serum around the wound.

[1] Where soap has been used to clean wounds, all traces of it should be removed before the application of quaternary ammonium compounds because soap neutralizes the activity of such compounds.

Benzalkonium chloride, in a 1% concentration, has been demonstrated to be effective in the local treatment of wounds in guinea pigs infected with rabies virus. It should be noted that at this concentration quaternary ammonium compounds may exert a deleterious effect on tissues.

Mr. Fuller Said It Well

BY CHARLES L. HUDSON, M.D.
PRESIDENT, AMA

Buckminster Fuller, the American architect-engineer-philosopher-poet, has predicted that education will become the largest and most important of all industries.

He bases this on a belief that knowledge is the one resource of man which not only cannot be depleted, but can, indeed, be consciously increased. In the advanced, automated world of the near future, he says, "leisure" time gained from the workaday world through automation may be spent in the classroom; in fact, people may be paid to go to school.

Physicians have long understood the value of knowledge — of education.

We are forever involved in the task of "keeping up" — without pay it may be noted.

A number of reservoirs of medical information may be tapped by the physician. These include colleagues, medical journals, medical news publications, continuing education courses, medical meetings and conventions, drug detail men and miscellaneous others.

Every year there is the "big show" where the physician can tap practically every reservoir: the Annual Convention of the American Medical Association.

The 116th Annual Convention of the American Medical Association will be held in Atlantic City June 18-22 this year.

If knowledge is a resource, as Buckminster Fuller says it is, the AMA Annual Convention is surely a mother lode.

Mark 100 Years Of Vital Records

Exactly 100 years ago Michigan first began to collect state-wide records on births, deaths, and marriages.

In 1897 divorces were added to the permanent list; in 1933 adoptions were included.

Before 1921, when the State Health Department assumed the job, compilation was done by the Secretary of State's office.

THE RECORDS for 1867 are incomplete at best. Detroit did not respond in the first report, nor did many counties. Subsequent reports included these areas, however.

The period from April 1867 to April 1868 shows 19,544 births. The 1966-1967 total is 165,794. As far as marriages are concerned, there were 5,703 in 1867. Last year there were 83,906. Deaths for 1867 were 6,250; for 1966, 74,596.

SINCE 1868 THE Health Department records have grown tremendously. Currently, 350,000 events a year are registered and filed in the Department's archives.

From these records much valuable information may be gleaned. For example, population projections can be made, and disease patterns can be charted from the listed causes of death. Also, the "Annual Statistical Report" can be compiled from these records.

SEEK CAMERA TO HELP EVALUATE TRANSPLANTS

Recent grants from the University of Michigan Phoenix Project will finance work to develop a technique helpful in evaluating kidney transplants.

In the project directed by Glenn F. Knoll, Assistant Professor of Nuclear Engineering, the design of gamma-ray cameras will be evaluated for use in nuclear medicine at U-M. Such a camera will then be constructed to help treat patients with various tumors.

Under the current system at the University, Professor Knoll explained, isotopes are injected into a patient's body so they will concentrate in a certain area, generally in a tumor. A scanning unit, as it moves back and forth across the area, shows the concentration.

Professor Knoll plans to provide a gamma-ray detector in which an instantaneous total picture of the isotope pattern can be seen. Although this total picture concept is not new, Professor Knoll hopes to improve upon current units which perform this function.

Look how many ways **Thorazine®** brand of **chlorpromazine** can help

	Tranquilizer	**Potentiator**	**Antiemetic**
Agitation	●		
Alcoholism	●		●
Anxiety	●		
Cancer patients	●	●	●
Severe neurodermatitis	●		
Drug addiction withdrawal symptoms	●		●
Emotional disturbances (moderate to severe)	●		
Nausea & vomiting	●		●
Neurological disorders	●		
Obstetrics	●	●	●
Pain	●	●	●
Pediatrics	●	●	●
Porphyria	●	●	
Psychiatric disorders	●		
Hiccups—refractory	●		
Senile agitation	●		
Surgery	●	●	●
Tetanus	●	●	

'Thorazine' is useful as a specific adjuvant in the above named conditions.

The following is a brief precautionary statement. Before prescribing, the physician should be familiar with the complete prescribing information in SK&F literature or *PDR*. *Contraindications:* Comatose states or the presence of large amounts of C.N.S. depressants. *Precautions:* Potentiation of C.N.S. depressants may occur (reduce dosage of C.N.S. depressants when used concomitantly). Antiemetic effect may mask other conditions. Possibility of drowsiness should be borne in mind for patients who drive cars, etc. In pregnancy, use only when necessary to the welfare of the patient. *Side Effects:* Occasionally transitory drowsiness; dry mouth; nasal congestion; constipation; amenorrhea; mild fever; hypotensive effects, sometimes severe with I.M. administration; epinephrine effects may be reversed; dermatological reactions; parkinsonism-like symptoms on high dosage (in rare instances, may persist); weight gain; miosis; lactation and moderate breast engorgement (in females on high dosages); and less frequently cholestatic jaundice. Side effects occurring rarely include: mydriasis; agranulocytosis; skin pigmentation, lenticular and corneal deposits (after prolonged substantial dosages).

For a comprehensive presentation of 'Thorazine' prescribing information and side effects reported with phenothiazine derivatives, please refer to SK&F literature or *PDR.*

Smith Kline & French Laboratories SK&F

M. D. Schools Graduate More; D. O. Schools Down

Colleges of medicine are responding to the challenge to graduate more doctors of medicine.

Statistics from the U.S. Department of Health, Education and Welfare also show that while more doctors of medicine are being trained, there has been a decrease in the number of osteopaths turned out.

During the period from 1949 to 1966, Health, Education and Welfare reports a jump in the M.D. college enrollments and a drop in D.O. school figures.

While the number of D.O. students has varied considerably over this period and has slumped from a high of 1,944 in 1960-1961 to the 1966 total of 1,681, the number of M.D. schools and students has shown a steady increase.

In 1949-1950 there were 25,103 students enrolled in 79 medical schools. In 1964-1965 there were 32,428 medical students in 88 schools. An additional 15 medical schools are at various stages of development.

The number of M.D. students from 1960-1961 to 1964-1965 has increased from 6,994 to 7,405.

The American Osteopathic Association reports of January 1966 show that the five osteopathic schools have a total of 1,681 students. This total is smaller than the enrollment in 1949-1950 when there were 1,778; it is smaller than in 1954-1955 when there were 1,867; it is smaller than in 1959-1960 when there were 1,915; it is smaller than in 1960-1961 when there were 1,944; and the 1,681 students this year is the same number enrolled last year in the five D.O. schools.

The above statistics are from the U.S. Department of Health, Education and Welfare as reported by the American Medical Association and the American Osteopathic Association.

* * *

The total number of M.D.'s and D.O.'s in practice show similar figures for 1960 and 1965.

The number of M.D.'s increased from 260,484 in 1960 to 292,088 in 1965.

The number of D.O.'s decreased from 14,350 in 1960 to 13,027 in 1965.

The numbers of M.D.'s and D.O.'s in private practice show similar figures for 1960 and 1965.

The number of M.D.'s in private practice increased from 179,176 to 190,748.

The number of D.O.'s in private practice decreased from 11,034 to 9,996 in 1965.

Again these statistics are from the U.S. Department of Health, Education and Welfare.

HIGH LEVEL ACCIDENT INSURANCE

A special form of Accidental Death and Dismemberment coverage designed to provide substantial benefits for loss of life, limbs, or sight as the result of bodily injuries due to accident.

OUTLINE OF BENEFITS

Loss of Life	The Principal Sum
Loss of Both Hands or Both Feet	The Principal Sum
Loss of Both Eyes	The Principal Sum
Loss of One Hand and One Foot	The Principal Sum
Loss of One Eye and One Foot or One Hand	The Principal Sum
Loss of One Hand or One Foot	One-Half The Principal Sum
Loss of One Eye	One-Half The Principal Sum

Dependent: You may purchase this insurance for your wife if she is not eligible as a member. The amount of Principal Sum on your wife may not exceed 50% of the amount on yourself.

AMOUNT OF INSURANCE AND ANNUAL PREMIUM:

Member Only	Annual Premium*
$100,000	$72.00
75,000	54.00
50,000	36.00
25,000	18.00

MEMBER	SPOUSE	Annual Premium*
$100,000	$50,000	$108.00
75,000	37,500	81.00
50,000	25,000	54.00
25,000	12,500	27.00

*If annual premium exceeds $50.00 premiums may be paid semi-annually at the rate of one-half the annual premium.

24 Hours Protection. Around the clock protection. Sports and recreation as well as professional duties are fully covered. World wide coverage with no territorial restrictions.

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mail bag

All of us associated with AMPAC owe much to *Michigan Medicine* for boosting MDPAC and AMPAC. Michigan is one of the states providing leadership in the use of the state medical society journal to promote PAC membership and activity. Much of your effort on behalf of MDPAC and AMPAC has been Xeroxed and mailed to the other 49 states in this country to illustrate how effectively Michigan uses its journal to support the PAC movement.

Thanks again for your continuing support.

Sincerely,
James W. Rosevear
Field Representative
AMPAC

Thank you for the copies of the AMA Career Handbook, "Horizons Unlimited". We have used them in several ways. As the largest associated group of physicians in the city, we frequently receive inquiries concerning careers in medicine and associated fields and they are being handed out from time to time to such young people as approach us in this way. Several copies are being placed about the waiting room. One copy went to a high school girl who is presently working for us in a clerical capacity and who may possibly be interested in a career in x-ray technology.

Copies were also sent to several high school counselors in this area who have been kind enough to help us staff our office or hospital x-ray departments with promising young people.

I found the brochure extremely well done and believe that it will be most useful to young people needing a description of possible careers in medicine and related fields.

Clarence P. Chrest, M.D.
Kalamazoo

Dear Dr. Masters:

The "new look" of *Michigan Medicine* is very attractive and a distinct improvement over the old. Since the editorial content has always been excellent, this seems only fair . . .

David J. Severn
Associate Editor
Physicians Publications
New York City

Vacation trip....

Motion sickness?

This time it'll be different. Emetrol taken before the trip begins will usually prevent nausea and vomiting. Emetrol is effective and safe...most helpful where safety is most important. It acts locally—not systemically.

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phosphorated carbohydrate solution
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Increase Information about Chiropractic

Many Michigan physicians are interested in a new AMA educational campaign to inform the American people about chiropractic.

In a communication to the Special Subcommittee on Employees' Compensation of the United States Senate's Committee on Labor and Public Welfare, AMA Executive Vice President F. J. L. Blasingame, M.D., explained why physicians and the AMA are so opposed to chiropractic.

"CHIROPRACTIC IS NOT based on scientific principles," said Doctor Blasingame. "The medical profession regards chiropractic as a cult, because it follows the hypothesis of its founder that disease results from pressure on nerves due to minor misalignments of the spinal column. Based on such a premise, chiropractors claim that such conditions as allergies, diabetes, heart trouble, tonsillitis and even cancer, to name a few, can be cured by adjusting or manipulating certain areas of the spinal column. Such a theory, of course, runs counter to the established facts of medical science."

"Chiropractors," said Doctor Blasingame, "are not educated or equipped, either by background or training, to diagnose human illness. This inability, coupled with their pseudo-scientific method of treatment and their vociferous stand against life-saving vaccines and against the well-recognized advances of the medical profession in the control, diagnosis, treatment and prevention of disease requires,or perhaps demands, that no consideration be given them."

An article in *JAMA* points out that "The medical profession is faced with a continuing conflict between scientific medicine and cultist practices. This conflict is one that affects the life and health of thousands of persons.

"DOCTORS OF MEDICINE oppose cultist practices," said the *JAMA* article, "not because of any fear of competition, but from the desire to protect the public from the hazards of such practices. At best cultist 'treatment' of sick or injured persons is ineffective. It is harmful primarily because it keeps the patient from receiving effective medical care. It also leads to payments for services which are of no benefit.

"Perhaps the most common example of cultist practice is chiropractic. No scientific proof has ever been offered to support the theory of chiropractic and it has never been accepted as valid by any recognized scientific body."

In a Data Sheet on chiropractic, the AMA points out that "forty-eight states impose license limitations, prohibiting chiropractors from prescribing drugs and performing surgery. Two other states — Louisiana, and Mississippi — do not issue even limited licenses."

THE NUMBER OF chiropractors in the United States is uncertain, the Data Sheet reports. The latest census states there are 14,360. The American Chiropractic Association and the International Chiropractors Association, in their literature, claim there are approximately 25,000 chiropractors in the United States.

There are 12 schools of chiropractic, but none is accredited by any recognized, educational, accrediting body. The only stated "requirement" for admission is a high-school diploma, and a recent study of "admission requirements" showed that many of the schools do not require even high school graduation. The majority of instructors in most chiropractic schools are not trained or qualified as teachers of the basic sciences and do not possess college diplomas.

A new AMA pamphlet, *Chiropractic: The Unscientific Cult,* points out that "since the birth of chiropractic in 1895, the medical profession has been warning the public of the hazards involved in entrusting human health care to these cult practitioners.

"THE HOUSE OF DELEGATES, governing body of the AMA, has said: 'Either the theories and practices of scientific medicine are right and those of the cultists are wrong, or the theories and practices of the cultists are right and those of scientific medicine are wrong.' "

At the AMA's Third National Congress on Medical Quackery in Chicago, chiropractic was the theme of a half-day session on the program. Eugene Robillard, M.D., Associate Dean of the Faculty of Medicine of the University of Montreal, reported to the Congress on a recent study of chiropractic by the College of Physicians and Surgeons of Quebec.

"The College," said Doctor Robillard, "condemns chiropractic because chiropractic is false theory; the education of chiropractic is below acceptable standards; and because chiropractic is dangerous."

about doctors and their friends

Hugh Beckman, m.d., Clinical Instructor at Wayne State University, has received a grant from the National Institutes of Health for research on "Effects of Laser Energy on the Eye" to be performed at Sinai Hospital in Detroit.

The 1967 Conference on Psychiatry and Medical Education in Atlanta, Georgia, was attended by several Michigan men: Jose' J. Llinas, m.d., Lansing; M. Frolich, m.d., Ann Arbor; Morton Levitt, ph.d., Detroit; and Hilliard Jason, m.d., East Lansing.

James E. Harryman, m.d., Muskegon, a member of the MSMS Committee on Maternal Health, will present a paper at the September 1967 World Congress of Gynaecology and Obstetrics in Australia. Doctor Harryman will discuss "Air Embolism — A Cause of Maternal Death — 26 Cases."

Twenty-seven health-care experts from Michigan spoke at the 37th Annual Tri-State Hospital Assembly held in early May in Chicago. Prominent speakers were Albert E. Heustis, m.d., Director of the Michigan Department of Health, and Andrew Pattullo, Director of the Division of Hospitals for the W. K. Kellogg Foundation.

Among the new board members recently elected to the Detroit Rehabilitation Institute are Peter Clark, Publisher of the *Detroit News,* and Marjorie Peebles-Myers, m.d., Detroit. The Board now consists of thirty-two persons.

Liz Hyman, of the Grand Rapids *Press,* was given an award of $100 for her article "Aspirin Best Arthritis Treatment." Miss Hyman was one of eight winners in the 11th annual Russell L. Cecil Awards for excellence in writing about arthritis, sponsored by the Arthritis Foundation.

Norman E. Clarke, m.d., Beverly Hills, California, was recently honored at a special dinner, at Central Michigan University, Mt. Pleasant. In 1955 Doctor Clarke gave a collection of Midwestern American books to the Clarke Historical Library at Central Michigan University. The collection is one of the finest in the state. In the words of John Cumming, Director of the Library, "Doctor Clarke is one of the foremost book collectors in the United States. He has built an outstanding library here."

Bernard E. Lorimer, Midland Hospital Administrator, recently received the Key Award, the highest honor of the Tri-State Hospital Assembly, during its 37th annual meeting in Chicago. Administrator at Midland Hospital for the past 22 years, he served as president of the Michigan Hospital Association in 1963.

Alexander Blain, iii, m.d., Detroit, has been elected president of the Prismatic Club, a centennial literary club, for 1967.

Paul T. Salchow, m.d., after 28 years of service with the Detroit Department of Health, retired in May.

Richard J. Bing, m.d., Professor and Chairman of Internal Medicine at Wayne State University Medical School recently received $85,919 to continue a study on synthetical processes of the myocardium. The grant was part of a $298,150 grant given by the United States Public Health Service to Wayne State University.

To the first-place winner in the junior high division of the Flint Science Fair the Genesee County Medical Society awarded a special $50 prize. The recipient is Randy A. Brown, an eighth grader at Grand Blanc Junior High School.

Randy won top honors in the junior division and a $100 prize. In addition, he also won the $50 category award for an exhibit in the field of health and medicine, a certificate from the Army Research and Development Unit, and the Genesee Medical Society award.

Speaking at the West Shore Mental Health Clinic's annual dinner held recently in Muskegon was Kenneth Nickel, Grand Rapids psychiatrist. Doctor Nickel's topic was "Psychiatry in Russia," based on his recent visit to the Soviet Union.

MICHIGAN MEDICINE

DEADLINE FOR THIS BREAKING NEWS WAS MAY 22, 1967

Annual Session Committee Books Willard on "The New Physician"

(Watch for the July issue of Michigan Medicine and full details about the 1967 MSMS Annual Session in Grand Rapids)

The author of the "Willard Report" on "Meeting the Challenge of Family Practice" will come to Michigan for the MSMS Annual Scientific Session in Grand Rapids, September 27-28-29.

Wm. R. Willard, M.D., Vice-President of the University of Kentucky Medical Center, has accepted an invitation to speak at 2:00 p.m., September 27, at the Grand Rapids Civic Auditorium.

H. A. Towsley, M.D., Ann Arbor, Chairman of the MSMS Annual Session Scientific Program Committee, has arranged for an afternoon block on September 27 to cover two non-scientific subjects. Doctor Willard will lead a seminar on "The New Physician," and then a seminar will follow on "Regional Medical Programs in Heart, Cancer, Stroke."

Doctor Willard was chairman of the Ad Hoc Committee on Education and Family Practice of the Council on Medical Education of the AMA. The Committee report was made in the fall of 1966 and the February issue of *Michigan Medicine* carried an article about the six recommendations. The AMA House of Delegates in Las Vegas last November authorized the Council on Medical Education "to develop and initiate plans to implement the recommendations."

AMA-ERF Gives $26,000 To Michigan Schools

The American Medical Association's Education and Research Foundation has granted more than $26,000 to Michigan's three medical schools. The checks were presented to the schools at the May 24 MSMS Conference for Component Medical Society leaders in Detroit.

The University of Michigan received $14,000, $11,000 of which was composed of designated contributions. Wayne State University was granted approximately $9000, $6600 of which was designated. Michigan State University's new medical school was given nearly $3000, with $1300 of that amount designated.

Physicians contributing to AMA-ERF generally designate the recipient, often their alma maters, of their contribution

Upper Peninsula MDs To Confer at Escanaba

The Upper Peninsula Medical Society will hold its 74th Annual Meeting at Escanaba, June 9-10, at the Ludington House.

Among the visiting dignitaries will be the president of the Michigan State Medical Society, C. Allen Payne, M.D., who will make a short address.

Each year the U-P Society invites some of the distinguished medical authorities from Michigan and the Midwest to confer with the up-north doctors.

Out-of-state physicians participating on this year's program will be Charles E. Kee, M.D., Chief of Dermatology, United States Navy Hospital, San Diego; Fred J. Ansfield, M.D., University of Wisconsin; Colin Campbell, M.D., University of Minnesota; James W. Nellan, M.D., Team Physician for the Green Bay Packers; P. P. Kelalis, M.D., Mayo Clinic; Edmund C. Burke, M.D., Mayo Clinic; and Malcolm McCannel, M.D., University of Minnesota.

Michigan physicians appearing on the program will be: John Sigler, M.D., Detroit; Carl A. Moyer, M.D., Baraga; Tommy N. Evans, M.D., Detroit; Richard C. Schneider, M.D., Ann Arbor; and Stuart A. Finch, M.D., Ann Arbor.

Richard C. Bates, M.D., Lansing, will speak at the Banquet.

Presiding this year as president at the convention will be Norman L. Lindquist, M.D., Escanaba.

Over 100 physicians are expected to attend the two-day conference.

MSMS Conference on Challenge Of Change Is Well Received

"Thank you for covering those vital issues."

"The medical profession certainly does face changes."

"How can we show more leadership in these areas."

Those were among the comments heard in Detroit, May 24, at the end of the day-long MSMS conference on "The Challenge of Creative Change."

The new spring conference was sponsored for MSMS delegates and alternates, for county society presidents, secretaries and executive secretaries, and for members of The MSMS Council. The one-day workshop was held at the Wayne County Medical Society.

Outstanding Michigan leaders in medicine and related subjects spoke to the participants, with ample time for questions and answers.

Coming from out of the state for the program was Bernard P. Harrison, J.D., Director of the AMA Legislative Department, who discussed "Medicare and Medicaid." Several officials from Michigan Medical Service and Theodore Blizzard, Administrative Assistant, Program Development, Executive Office of Governor Romney, also addressed the group.

The many challenges and opportunities that were suggested for MSMS and county medical society study and action were wrapped up at the end of the day by Speaker James J. Lightbody, M.D., and Council Chairman Robert J. Mason, M.D.

Michigan Epilepsy Group Renames Jeffries

Benjamin Jeffries, M.D., Detroit, has been reelected president of the Michigan Epilepsy Center and Association. The election was made at the MEC-A's annual meeting.

Among those reelected to three-year terms as members of the Board of Directors were: Jasper E. McLaurin, M.D., Detroit; A. S. Narotzky, M.D., Ishpeming; and Joseph L. Whelan, M.D., Detroit.

HONORED AT SAGINAW

Harry M. Bishop, M.D., Saginaw, was recently honored with a retirement dinner by members of the Saginaw General Hospital medical staff. A Saginaw surgeon for 35 years, Doctor Bishop was presented a scroll and a silver tray for his service to the hospital.

FREEDOM NOW
WYATT

(Reprinted by permission of Cartoonist Stanley Wyatt and the College Board Review)

Attendance at Sports-Medicine Conclave Tops '66

"We are grateful to all the physicians who urged their high school coaches to attend our conference," declared James S. Feurig, M.D., after the MSMS Conference on Medical Aspects of High School Sports at the University of Michigan, May 25.

The turnout of coaches pleased Doctor Feurig, Chairman, and members of the MSMS Committee on the Medical Aspects of Organized Athletics. Last year about 60 team physicians attended and this year the coaches were invited too. The attendance May 25 surpassed 75 team doctors and 150 coaches.

"The coaches and trainers especially valued the demonstration of taping and the address by MHSAA Director Charlie Forsythe," Doctor Feurig stated. The team doctors and coaches also were generous in their praise for all the Michigan speakers and for W. D. Paul, M.D., the University of Iowa Team Physician.

Complete PG Series

Eighteen postgraduate medical education courses were held throughout the state this spring.

Sponsored by the Michigan State Medical Society in cooperation with the Michigan Department of Health, the University of Michigan, and Wayne State University, the programs were given in 10 Lower Peninsula towns, and 8 U-P centers.

Appearing on the programs were medical authorities from the University of Michigan and Wayne State University.

Harry A. Towsley, M.D., Ann Arbor, is chairman of this continuing education project.

Blue Shield Climbs in Michigan

In the annual report of Michigan Blue Shield, John C. McCabe, President, reported that Michigan Blue Shield had the largest net gain in enrollment in 1966 of the top 14 Blue Shield Plans. At the end of the year, 1,638,182 Blue Shield contracts protected 4,191,171 members, more than half of Michigan's population. The enrollment increased by 374,718 members during 1966.

Mr. McCabe also noted that operating expenses were 6.7 percent of subscription income — lowest of the eight largest Blue Shield Plans in the nation. (The national average for operational expense was 8.8 percent of subscription income.)

Looking ahead, McCabe said, "Momentous changes are taking place in the field of medical economics, and we must lead rather than simply react to change." He pointed out that Blue Shield also is conducting an in-depth study of prepayment health care, sampling the opinions of leaders in the medical, public, industrial, commercial and farming communities.

McCabe explained, "We believe that delicate balance between public and private sectors in medical economics must be maintained. Because of this belief, we will continue to demonstrate that Blue Shield has the capacity and experience in medical economics to make it unnecessary for government to extend its involvement in the physician-patient relationship."

Michigan Orthopaedic Event Slated June 9 at Gaylord

Many Michigan physicians will participate in the June 9 meeting of the Michigan Orthopaedic Society at Gaylord.

George T. Aiken, M.D., Grand Rapids, will preside at one of the meetings. Included on the program will be the following physicians: Hira Branch, M.D., Flint; Thomas R. Peterson, M.D., Ann Arbor; John O. Esslinger, M.D., Birmingham; William S. Smith, M.D., Ann Arbor; Herbert Kaufer, M.D., Ann Arbor; A. Jackson Day, M.D., Detroit; and James Horvath, M.D., Detroit.

Also on the program were: C. Leslie Mitchell, M.D., Detroit; Robert W. Bailey, M.D., Ann Arbor; Paul A. Kelley, M.D., Ann Arbor; David C. Mitchell, M.D., Detroit; Victor S. Mateskon, M.D., Petoskey; and Alfred B. Swanson, M.D., Grand Rapids.

ACOG Exhibit Contest Won by WSU Entry

First prize for "the most outstanding scientific exhibit in the nation" has been awarded to three members of the Wayne State University Medical School faculty by the American College of Obstetricians and Gynecologists.

Sharing the honor are T. N. Evans, Professor and Chairman of the Department of Obstetrics and Gynecology, George E. LaCroix, Associate Professor, and Bernard Mandelbaum, Instructor, of the same department.

Their exhibit, "Prevention of Prematurity," was selected from 58 entries.

MSMS Delegates Going to Hearing On AMA Insurance

The Michigan delegation to the AMA is continuing its careful study of the current AMA issue over the group disability insurance program.

The AMA Board of Trustees now is preparing its recommendation to the AMA convention in Atlantic City, June 18-22, on proposed changes in rates and benefits to make the program actuarily sound.

The AMA House of Delegates has appointed a special reference committee to hold an open hearing at the convention on the AMA Board recommendations. Luther R. Leader, M.D., Chairman of the MSMS delegation, reports that Michigan will be well represented at the hearing.

The MSMS delegates recently held a meeting with a representative of the present insurance carrier .

Doctor Leader expressed appreciation to the many MSMS members who have written directly to him or to the MSMS office voicing their views on the insurance program.

Interested MSMS members may read details about the AMA group disability insurance program and proposed changes in *The AMA News.*

Harris Applauds Newsmen at MSMS Conference at U-M

Newspapers, radio and TV stations were applauded by MSMS President-Elect B. M. Harris, M.D., at the Michigan Conference on Medical News Reporting, May 12, at the University of Michigan.

And he also appealed for their continued cooperation. In part, Doctor Harris told the workshop:

"One of the major functions of the state medical society is to provide medical care and information so the residents of Michigan will live healthier, happier lives.

"The medical profession must be able to communicate our concerns and efforts to the public and to the mass media. We do have the opportunity every day to talk to many, many patients and friends. But we need the cooperation of the newspapers, radio and television stations to carry out our educational efforts."

The MSMS conference heard several physicians and professors and also from representatives of the Michigan Press Association, Detroit *Free Press,* Grand Rapids *Press,* Radio Station WUOM at Ann Arbor, and Radio Station WFDF at Flint.

Statement Suggests Physician's Role in Smoking-Health

Michigan doctors have a role to play in the growing concern about smoking and health.

The MSMS Council has approved the following statement offered by the MSMS Committee on Cancer:

"The Committee on Cancer of the Michigan State Medical Society recognizes that control of smoking is an area in which doctors of medicine can be effective in the control of cancer."

Mark Your Calendar Now . . .

102nd Annual Scientific Session
Michigan State Medical Society
Grand Rapids, September 27-28-29

Seven Out-Of-State Authorities Coming For Coller-Penberthy-Thirlby Event

Noted medical authorities from throughout the nation are scheduled to speak at the Forty-Seventh Annual Coller-Penberthy-Thirlby Medical Conference in Traverse City on July 27-28. Meetings will be at the Park Place Motor Inn.

In addition to the many Michigan physicians participating on the program, seven out-of-state experts will take part.

William A. Altemeier, M.D., Professor and Chairman of the Department of Surgery at Cincinnati General Hospital, will speak on "Problems in the Treatment of Giant Ulcers of the Stomach." Merle M. Musselman, M.D., Department of Surgery of the University of Nebraska, will discuss "Vascular Injuries Associated with Fractures."

"Some New Observations on the Physiology of Gastric Secretion" will be the topic of Lester R. Dragstedt, M.D., Research Professor of Surgery at the University of Florida College of Medicine.

George D. Zuidema, M.D., Professor and Director of the Department of Surgery at Johns Hopkins University School of Medicine, will speak on "An Evaluation of Vena Cava Plication for Thromboembolism."

Professor and Chairman of the Department of Surgery at Stanford Medical Center J. Garrott Allen, M.D., will discuss "Surgical Treatment of Cancer of the Breast."

"Resection of Hepatic Tumors" will be the subject of M. S. DeWeese, M.D., Professor and Chairman, Department of Surgery at the University of Missouri School of Medicine.

Mark A. Hayes, M.D., Professor of Surgery at Yale University School of Medicine, will speak on "A Re-examination of the Nodular Thyroid Problem."

FAMILY LIFE EDUCATION TOPIC FOR STUDY CLUBS

Furthering the Michigan State Medical Society's current effort on Family Life Education were three physicians who participated in the spring conferences of the Michigan Child Study Association.

Richard Melles, M.D., Kalamazoo, spoke at the Buchanan meeting, Jack Thompson, M.D., Flint, at the Owosso conference, and Edwin C. Galsterer, M.D., Saginaw, at the Alma meeting and presented the film "Parent to Child about Sex."

"Families in Focus" was the theme of the three program planning meetings.

Nominations Sought for Top MSMS Awards

MSMS members wishing to suggest Michigan psysicians for "MSMS Certificates of Commendation" and for the "Michigan's Outstanding Physician Award" are invited to discuss their suggested candidates with their county medical society presidents.

Deadlines are near for the nominations and then special MSMS House of Delegate Committees will get busy with the selection process. Invitations have been mailed to every county medical society president with nomination forms.

The House of Delegates Committee to Select Michigan's Outstanding Physician is under the chairmanship of G. H. Rigterink, M.D., Kalamazoo. Deadline for nominations is June 1. The first such award in 1965 was presented by the MSMS House of Delegates to Franklin L. Troost, M.D., of Holt, and the 1966 award went posthumously to Wm. A. Hyland, M.D., of Grand Rapids.

The House of Delegates Committee on Certificates of Commendation is under the chairmanship of Alfred H. Whittaker, M.D., Detroit. Deadline for nominations is July 1.

Certificates have been presented since 1962 to the following:

From Detroit: Charles S. Kennedy, M.D.; Robert L. Novy, M.D.; Charles J. Jentgen, M.D.; Remus J. Robinson, M.D.; Traian Leucutia, M.D.; Ralph H. Pino, M.D.

From Ann Arbor: Jerome W. Conn, M.D.; John M. Sheldon, M.D.; Norman F. Miller, M.D.; Fred J. Hodges, M.D.; Arthur C. Curtis, M.D.; Mark Marshall, M.D.; Harry A. Towsley, M.D.

From Lansing: G. D. Cummings, M.D.; Goldie B. Corneliuson, M.D.

From Grand Rapids: Alfred B. Swanson, M.D.

From Bloomfield Hills: Forest D. Dodrill, M.D.

From Milan: John S. DeTar, M.D.

From Saginaw: Robert M. Heavenrich, M.D.

From Ypsilanti: Orus R. Yoder, M.D.

From Kalamazoo: E. Gifford Upjohn, M.D.; Homer H. Stryker, M.D.

From Mt. Pleasant: Lionel L. Davis, M.D.

From Coldwater: H. J. Meier, M.D.

Have You Started Art Show Entry?

The opportunity for doctors and their wives to submit their artistic works in competition will again be a part of the Annual Session at Grand Rapids.

MSMS members and their wives are eligible to submit as many as four original works.

According to Mrs. Lloyd A. Kammeraad, Chairman of the Show, competition covers a wide field of artistic endeavor divided into seven categories:

I. Painting. Oil, polymer, encaustic acrylic, lacquer, etc.

II. Painting. Watercolor, casein, tempera, pastels, gouache.

III. Sculpture. Wood, stone, ceramic, metal.

IV. Ceramics.

V. Drawing and Graphic Art. All print techniques.

VI. Three-Dimensional Design. Weaving, stitchery, jewelry.

VII. Photography.

Paintings must be framed. Water colors, drawings, and prints must be matted or framed. Framed entries must be equipped with eyelets or wire suitable for hanging.

Mark your calendar for September 27-29 for the Art Show at the Pantlind Hotel in Grand Rapids, urges Mrs. Kammeraad as she seeks entries and viewers.

AMA, MSMS Invites Retired Physicians To Consider Return

The American Medical Association adopted a resolution in November 1966 that the AMA take measures to insure the attention of medical societies to the need for appropriate utilization of retired physicians and inactive nurses.

To implement this resolution, the AMA Placement Service wishes to develop (1) a roster of available opportunities for full or part-time physician employment and (2) a list of physicians interested in returning to limited practice of service.

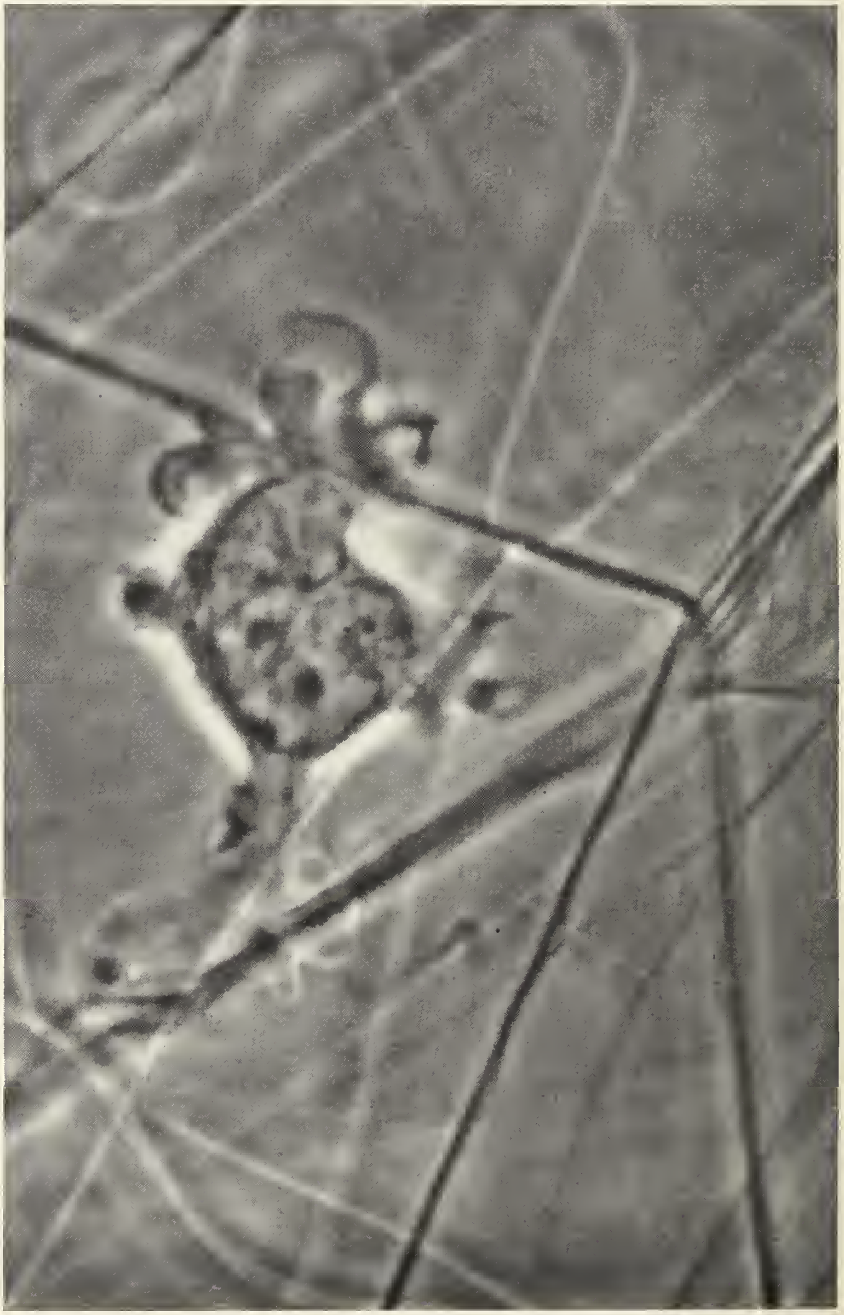
MSMS members who are interested in this program are requested to contact the MSMS Headquarters, 120 West Saginaw, East Lansing.

INFLAMMATION:
A cellular fight for life

A SYNTEX REPORT based on recently developed hypotheses about topical corticosteroids, including the cellular theories of inflammation by Thomas F. Dougherty, Ph.D., University of Utah.

You are looking at a fibroblast fighting for life. This cell—one of the most common found in connective tissue—has literally been poisoned by cytotoxins released from other cells that have ruptured. Soon, if the abnormal activity of this fibroblast does not cease, it, too, will rupture and die—one more casualty in the inflammatory wave of destruction precipitated by injury.

Until a short time ago no one had ever witnessed such a scene at the cellular level. Now, through advanced cinemicrographic techniques, it is possible to view and photograph the inflammatory process as produced experimentally in living animal tissue. This method permits new insight into the mechanism of inflammation and the role of corticosteroids in therapeutic management. Equally important, these techniques shed new light on factors that may make one corticosteroid more effective than another—factors that can be correlated with other chemical, biologic, and clinical parameters.

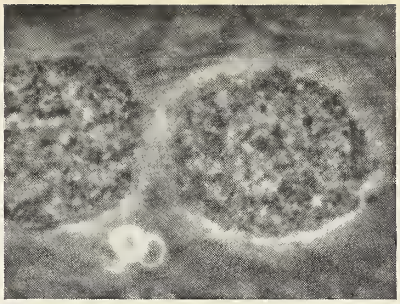


Visual evidence of how corticosteroids influence the inflammatory reaction

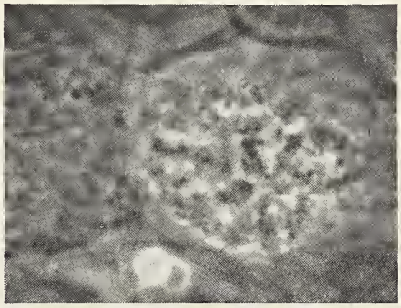
Working with phase-contrast cinemicrography on living animal tissue, Doctors Thomas F. Dougherty and David Berliner of the University of Utah College of Medicine have actually filmed cellular events that occur during the inflammatory reaction. This remarkable study* and additional work by these investigators, as well as by others, have established a new theoretical biologic basis for the antiinflammatory effect of the corticosteroids. (It must be noted that other theories, such as the lysosome or so-called "suicide bag" theory, have been postulated, although it is quite likely that there are more similarities than differences among the various theoretical models.)

The inflammatory wave of destruction

In this investigation an injurious injection of gelatin is used to set off an inflammatory reaction in living mouse tissue. What follows is a wave of destructive cellular activity that comprises the inflammatory response to injury. Mast cells (which contain heparin, serotonin and histamine) take up water, swell and rupture, releasing their contents, which are toxic outside the mast cell wall. These toxins, in turn, cause disintegration of other cells (such as fibroblasts) and the release of additional toxic material. Capillaries, too, take up water and leak unformed blood elements, causing edema. And polymorphonuclears, lymphocytes and perithelial cells invade the inflamed site. As a result of all these changes, the cellular environment reaches a state of turmoil.



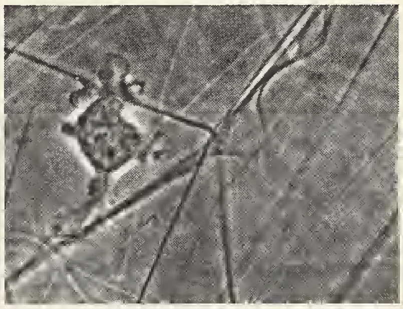
Phase-contrast microscopy showing mast cell before injury.



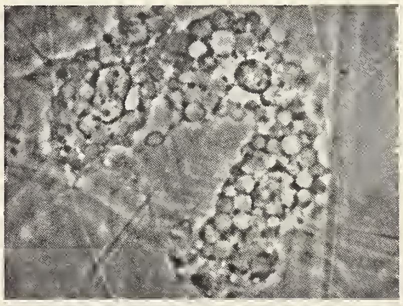
Mast cell (after injury) has broken up and released cytotoxins.

How corticosteroids change the picture

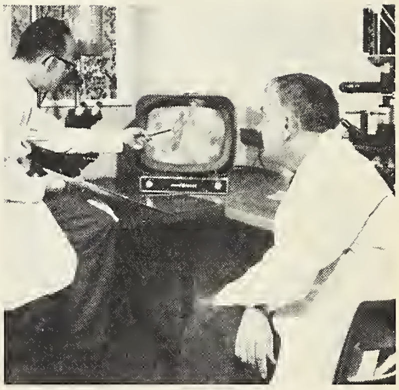
Corticosteroids appear to virtually stop the abnormal cellular activity that constitutes the inflammatory reaction. This permits the body's natural resources to clear up the inflamed area and repair the damaged tissue. This interpretation is supported by the fact that when the injurious gelatin solution is injected simultaneously with a corticosteroid – Synalar (fluocinolone acetonide) – the inflammatory pattern simply does not develop.



Fibroblast in high state of activity, much distorted.



Mast cells showing effects of corticosteroid action: cells are normal in size, shape and activity.



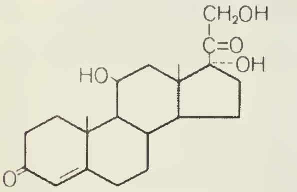
In summarizing his study Doctor Dougherty states: "...we also feel this work may explain why one corticosteroid helps a patient more rapidly and effectively than another. If it does, it is because one corticosteroid is the fastest, most effective inhibitor of the series of inflammatory events at the tissue level."

A New View of Corticosteroid Action in Inflammatory Dermatoses, a film based on this study, is now available from your Syntex representative.

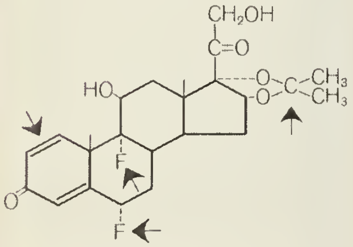
See last page for contraindications, precautions, side effects and dosage.

How advances in chemical design have achieved greater steroid potency

The chemical modification of corticosteroid molecules from the advent of hydrocortisone to the development of Synalar (fluocinolone acetonide) is a prime example of how biochemists can "design" to increase therapeutic activity and minimize undesirable side actions. Below, for example, we see the important changes that were made in reference to the hydrocortisone molecule to produce fluocinolone acetonide, one of the most active of all topical corticosteroids. As a result, a 0.01% preparation of Synalar (fluocinolone acetonide) has been reported to do the work of a 1% hydrocortisone product containing 100 times more cortiscosteroid. And it can often do it more effectively.



Hydrocortisone

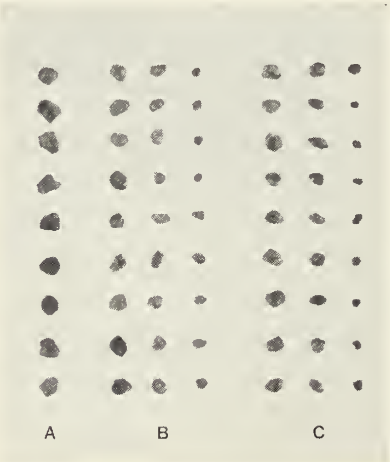


Fluocinolone Acetonide (Synalar)

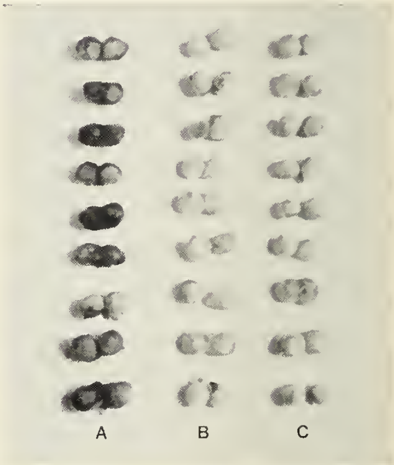
- ☐ *a double bond between carbons 1 and 2*
- ☐ *fluorine substitutions at* both *the 6-α, and the 9-α positions*
- ☐ *the addition of the acetonide at the 16-α, 17-α positions, thus providing one of the most potent topical corticosteroids available.*

How bioassay tests are used to "predict" therapeutic potential

Biologic assays are another tool used by researchers to help establish the relative activity of corticosteroids. To date no single method of assaying corticosteroid activity has emerged as the ideal "yardstick" for predicting therapeutic potential. Taken together, however, these methods have proved useful. When such tests are run on various corticosteroids, a definite order of corticosteroid activity becomes evident. Compounds with the highest order of activity may be expected to merit clinical trial to establish their high therapeutic potential. When assayed by these methods, fluocinolone acetonide (Synalar) emerges as one of the most active topical corticosteroids, milligram for milligram, available for clinical application today.



THE THYMUS INVOLUTION ASSAY[1-4] is run on adrenalectomized rats. The sizes of the glands are measured, and the degree of involution caused by the steroid is determined as an indication of its potency. In the above photo, the comparative involution of thymus glands achieved with hydrocortisone and Synalar (fluocinolone acetonide) is shown. Untreated controls (A) show normal size. Group B – injected with 1, 2 and 4 mg. of hydrocortisone – show progressively smaller thymuses as does Group C – injected with fluocinolone acetonide – but with only 1/500th the dose of hydrocortisone.



THE ANTIGRANULOMA ASSAY[1-4] also utilizes adrenalectomized rats. Granulomas are induced by subcutaneous implantation of cotton pellets on either side of the thorax. The degree of granuloma inhibition achieved by a steroid reflects its potency. The above photo shows the inhibition of granuloma formation achieved with hydrocortisone and Synalar (fluocinolone acetonide). Untreated controls (A) show large, red granulomas adhering to the pellets. Group B, receiving hydrocortisone and Group C, receiving fluocinolone acetonide, show little, if any, granuloma formation. Fluocinolone acetonide produced the same effect as hydrocortisone with only 1/500th the dose. This assay, as well as the thymus involution assay, measures systemic rather than topical corticosteroid activity. Nevertheless, results by these methods correlate well with other assays and with the milligram potencies of topical steroids in current clinical use.

Worldwide clinical experience confirms the predictable therapeutic potential of Synalar

It is particularly gratifying that the promise of the advanced chemical design and high order of bioassay activity of Synalar (fluocinolone acetonide) has been confirmed by widespread therapeutic application. Indeed, the impressive clinical response rate of Synalar has been documented in no fewer than 232 papers from 22 countries.

Representative Clinical Results with Synalar*

Efficacy Documented in over 4,000 Patients

Condition	Number of Publications	Number of Patients	Significant Improvement†
Contact Dermatitis	27	750	713
Eczematous Dermatitis	21	472	409
Seborrheic Dermatitis	18	442	426
Atopic Dermatitis	24	460	426
Psoriasis	36	1,699	1,510
Neurodermatitis	18	351	324
Total	144	4,174	3,808

*Complete bibliography on request.

†Expressed by the authors as excellent, very good, good, complete remission of inflammation, etc.

PRESCRIBING INFORMATION

For initiation of therapy: Cream 0.025%, 5 and 15 Gm. tubes, 425 Gm. jars; *for emollient effect:* Ointment 0.025%, 15 Gm. tubes; *for maintenance therapy:* Cream 0.01%, 15 and 45 Gm. tubes, 120 Gm. jars; *for intertriginous or hairy sites:* Solution 0.01%, 20 cc. and 60 cc. plastic squeeze bottles; *for infected inflammatory dermatoses:* Neo-Synalar® Cream (0.025% fluocinolone acetonide, neomycin sulfate, equivalent to 0.35% neomycin base), 5 and 15 Gm. tubes.

CONTRAINDICATIONS: Tuberculous, fungal, and most viral lesions of the skin, (including herpes simplex, vaccinia, and varicella). Not for ophthalmic use. Contraindicated in individuals with a history of hypersensitivity to any of the components. PRECAUTIONS: Synalar preparations are virtually nonsensitizing and nonirritating. However, the solution may produce burning or stinging when applied to denuded or fissured areas. In some patients with dry lesions, the solution may increase dryness, scaling or itching. While topical steroids have not been reported to have an adverse effect on pregnancy, the safety of their use on pregnant females has not absolutely been established. Therefore, they should not be used extensively on pregnant patients, in large amounts, or for prolonged periods of time. Prolonged use of any antibiotic may result in overgrowth of nonsusceptible organisms; if this occurs, appropriate therapy should be instituted. When severe local infection or systemic infection exists, the use of systemic antibiotics should be considered, based on susceptibility testing. SIDE EFFECTS: Side effects are not ordinarily encountered with topically applied corticosteroids. As with all drugs, however, a few patients may react unfavorably to Synalar under certain conditions. The neomycin in Neo-Synalar Cream rarely produces allergic reactions.

REFERENCES: 1. Lerner, L. J., Bianchi, A., Turkheimer, A. R., Singer, F. M., and Borman, A.: Anti-inflammatory steroids: potency, duration and modification of activities. Ann NY Acad Sci 116:1071 (Aug. 27) 1964. 2. Idem: Comparison of anti-granuloma, thymolytic and glucocorticoid activities of anti-inflammatory steroids. Proc Soc Exp Biol Med 116:385 (June) 1964. 3. Ringler, A.: Activities of adrenocorticosteroids in experimental animals and man, in Dorfman, R. I.: Methods of hormone research, New York, Academic Press, 1964. vol. III. pp. 234-280. 4. Gubersky, V. R.: To be published.

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Milligram for milligram one of the most active topical corticosteroids available

Rapid and predictable in antiinflammatory and antipruritic activity

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Bicknell Installed; WCMS Picks Danforth For '68-'69 Leader

The annual meeting of the Wayne County Medical Society featured the installation of Frank Bicknell, M.D., as president, and the announcement that the WCMS members had elected James C. Danforth, Jr., M.D., as president-elect. Doctor Danforth will become president next May.

The Election Committee also announced that Wyman C. C. Cole, Jr., M.D., had been elected secretary for 1967-1968.

Retiring President Brock E. Brush, M.D., and President Bicknell, gave short addresses.

Harrell To Succeed Curtis at U-M

E. Richard Harrell, Jr., M.D., is the new chairman of the U-M Medical School Dermatology Department. He has served the Department since 1949, when he was appointed assistant resident in dermatology. In 1953 he was advanced to assistant professor; in 1956, associate professor; in 1961 professor.

Doctor Harrell succeeds Arthur C. Curtis, M.D., who retires July 1 after 21 years as head of the Department.

The U-M Regents made another recent appointment naming John R. Platt as acting director of the University of Michigan's Mental Health Research Institute and Warren T. Norman as acting chairman of the Department of Psychology.

HOFFS, AUSTIN LEAD STATE ANESTHESIOLOGISTS

Newly-Elected President and Section Chairman of the Michigan Society of Anesthesiologists is Albertus Hoffs, M.D., Grand Rapids. Also recently elected are: Shirley Austin, M.D., Belleville, as Society President-Elect and Section Vice-Chairman, and Ralph E. Bauer, M.D., Detroit, as Secretary-Treasurer and Secretary of the Section.

Currently representing the Society as delegate and alternate to the Michigan State Medical Society are Ralph Askam, M.D., Muskegon, and John D. Snider, M.D., Grand Rapids. At the annual meeting, Doctor Askam was reelected, and Bernard Sivak, M.D., Southfield, was elected alternate for the next year.

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Health Careers Mobile Going To Island for Summer Months

Many families visiting Mackinac Island in June and July will tour the Health Careers Mobile. The unit will be there for the midsummer meeting of the Michigan Health Council and the Michigan State Medical Society's Council.

Formal dedication of the Health Careers Mobile is planned July 14, with leaders from many of Michigan's health organizations taking part. The dedication will also help celebrate the beginning of the Health Council's 25th year of service.

Before going to Mackinac Island, the Health Careers Mobile was in Detroit for a visit to the three largest inner-city schools; in Fremont for the Newaygo County Health Careers Conference; in Traverse City for the Michigan PTA Convention; in Big Rapids at Ferris State College; in Grand Haven for National Hospital Week; in Holland during the Tulip Festival and in Hastings for Michigan Week.

Last year the handsome trailer toured Michigan under the sponsorship of MSMS. Many of the MSMS Centennial displays with historic flavor have been replaced with new exhibits aimed at interesting young people in health careers.

Careers Mobile Big Hit At Detroit Inner-City Schools; Invited Back

While some groups sponsored Love-Ins and Smoke-Ins in Detroit this spring, the Michigan Health Council promoted what might be called a Roll-In.

After a month at Greenfield Village, the refurbished Health Careers Mobile rolled into Detroit to visit three inner-city high schools — Central, Eastern, and Northwestern.

Purpose of the visit? Education and inspiration. Mention a career in medicine to a young person, and he will think you mean being a doctor or nurse. But the expansion of medical science has made this way of thinking as outmoded as seeing transportation only in terms of a horse or train.

The mobile unit parked in front of each of the schools for several days, often in conjunction with a careers conference, and thousands of young people visited it and learned about the many opportunities in medicine.

Most students were staggered by the panoply of opportunities in the field of medicine. In the words of Lucius May, Eastern High School Community Agent, "The most valuable thing about the visit to Eastern was that the students' eyes were really opened to the opportunities in the field of medicine."

"Many of the boys asked, 'How do I get to be a lab technician?' " he reported.

Some of the students were astonished to learn of old medical practices such as opening someone's skull to let out evil spirits; others deepened their grasp of classroom anatomy lessons through the plastic woman whose body systems light up; and everyone learned something about medicine.

"Most of the young people began to understand for the first time the progress of medicine and how much it has developed in the last hundred years," said William Loving, Community Coordinator for the Central High School area. "We were pleased and elated that we were one of the three schools selected for the Career Mobile's visit."

The students did not simply pass quickly through the exhibit and then leave. On hand throughout the tour were hostesses, who were wives of members of the Detroit Medical Society. These women told the students about careers in medicine and gave them pamphlets to deepen their knowledge of particular fields.

At each of the three schools Lionel Swan, M.D., President-Elect of the National Medical Association, inspired the entire student body by telling them, "The need is great and the reward of service to your fellowman unparalleled. You contribute toward making peoples' lives happier, healthier, and more productive. One of every ten students graduating between now and 1970 is needed on the nation's health team."

In view of this successful visit this spring, the Health Careers Mobile has been invited to return in November and again during the spring of 1968 by the Detroit Public Schools. Many junior high schools will be included.

mediscene

June 3-4 — Michigan Kidney Foundation Symposium on Kidney Diseases, University of Michigan Medical Center, Ann Arbor

June 8-10 — 74th Annual Meeting of Michigan Upper Peninsula Medical Society, Escanaba

June 14 — The Council, MSMS Headquarters, East Lansing

June 18-22 — 1967 AMA Annual Convention, Atlantic City, New Jersey

June 18 — Annual Convention of the Woman's Auxiliary to the American Medical Association, Atlantic City, New Jersey

July 13-15 — The Council, Grand Hotel, Mackinac Island

Aug. 25 — The Council, MSMS Headquarters, East Lansing

Sept. 14-16 — Annual Meeting of the American Thyroid Association, University of Michigan Medical School, Ann Arbor

Sept. 24-26 — MSMS House of Delegates, Black and Silver Room, Civic Auditorium, Grand Rapids

Sept. 26-27 — MSMS Woman's Auxiliary, Pantlind Hotel, Grand Rapids

Sept. 27 — MSMS Dinner Dance, Pantlind Hotel, Grand Rapids

Sept. 27-28 — Diet Therapy Conference, Pantlind Hotel, Grand Rapids

Sept. 27-29 — MSMS Annual Scientific Session, Civic Auditorium, Grand Rapids

Sept. 27-28 — Michigan State Medical Assistants Society Convention, Mr. President Motel, Grand Rapids

Sept. 29-Oct. 1 — American Academy of Child Psychiatry, University of Michigan Medical School, Ann Arbor

Oct. 5-7 — Medical School Alumni Reunion, University of Michigan Medical School, Ann Arbor

Oct. 9-13 — International Conference on Leukemia and Lymphoma, University of Michigan Medical School, Ann Arbor

Oct. 15-21 — National Community Health Week

Oct. 27-28 — Regional Meeting, American College of Physicians, University of Michigan Medical School, Ann Arbor

Nov. 2 — Southwestern Michigan Clinic Day

Nov. 8 — The Council, MSMS Headquarters, East Lansing

Nov. 15-17 — International Conference on Fertility and Family Planning — A World View, University of Michigan Medical School, Ann Arbor

Nov. 26-29 — AMA Clinical Convention, Houston

Nov. 26-29 — Conference on Genetics in Medicine, sponsored by the American College of Physicians, University of Michigan Medical School, Ann Arbor

Dec. 13 — The Council, MSMS Headquarters, East Lansing

Bill Boynansky

"Nothing to worry about — just an occasional aftereffect of some of the new miracle drugs!"

23 STATE COLLEGES AIDED BY HIGHER EDUCATION ACT

Federally-financed programs in such areas as poverty, health services, housing, youth opportunities, and land use are being operated this year by 23 Michigan colleges and universities under the Higher Education Act.

The State Board of Education reports that the programs are in three categories — community service, continuing education, and educational research.

NAMED TO SCHOOL STUDY

Dean Burns, M.D., Petoskey, recently was appointed a member of the Citizens Advisory Committee to the Michigan School Finance Study. The appointments of 39 leaders from business, industry, education, and other fields were made by the State Board of Education.

The study, authorized by the Michigan Legislature, is to delve into all aspects of educational financing.

after
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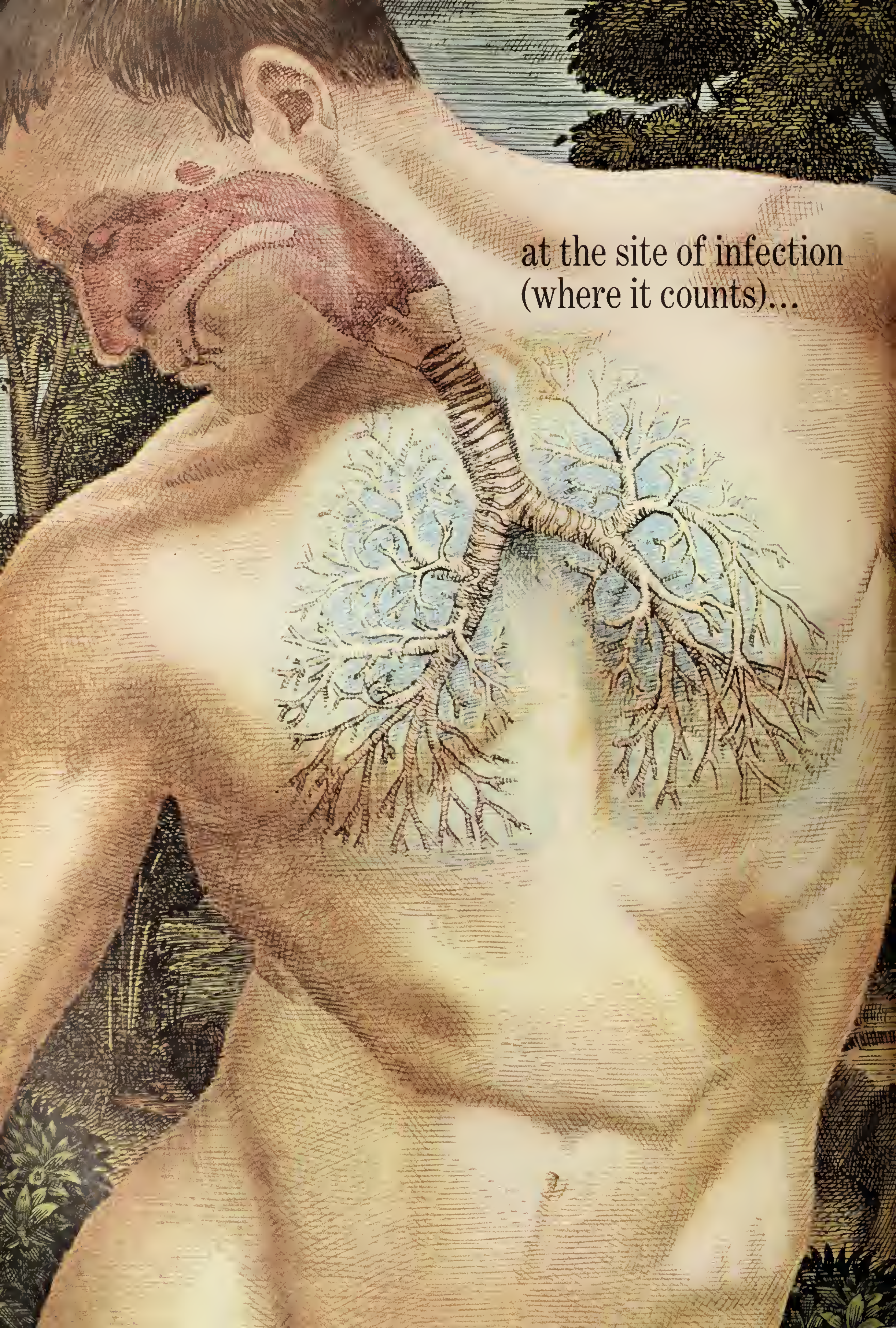
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(where it counts)...

Ilosone® provides more antibacterial activity than any other oral erythromycin

Acid stable, better absorbed . . . Ilosone produces faster, higher, more prolonged blood levels, even in the presence of food[1-3]

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In the treatment of patients with bacterial infections susceptible to erythromycin, Ilosone has compiled an excellent therapeutic record. Since it exerts its greatest activity against gram-positive organisms, it is particularly useful in common respiratory and soft-tissue bacterial infections. Ilosone kills—not merely inhibits—streptococci, pneumococci, and more strains of staphylococci than any other macrolide antibiotic. This bactericidal action, coupled with the high antibacterial levels attained, makes Ilosone especially valuable in patients with low host resistance, such as infants, debilitated individuals, and diabetics.

Ilosone has shown no cross-resistance with penicillin and may be effective against organisms that have become resistant to that agent. Despite its high antibacterial activity, Ilosone has demonstrated a low incidence of side reactions. Blood dyscrasias, ototoxicity, and tooth staining have not been observed. Infrequent cases of drug idiosyncrasy, manifested by a cholestatic jaundice, have occurred, but there have been no known definite residual effects.

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Erythromycin Estolate

(See next page for prescribing information.)

Ilosone®/the most active oral form of erythromycin

Description: Ilosone is the most active form of oral erythromycin that has been developed. Because it is stable in acid, well absorbed, and excreted in lesser amounts in the bile, it provides faster, higher, and longer-lasting levels of antibacterial activity (ABA) in the serum, even when taken with food, than do comparable doses of erythromycin.

Indications: Ilosone is indicated in infections caused by microorganisms sensitive to its action (especially staphylococci, hemolytic streptococci, and pneumococci). The drug is therefore useful in a high proportion of bacterial diseases encountered in clinical practice and particularly in the treatment of bacterial infections of the upper and lower respiratory tract and soft tissues.

In the treatment of acute bacterial pharyngitis and tonsillitis, this antibiotic has promptly eradicated the bacteria (streptococci) and has produced a parallel prompt clinical improvement. There have been no group A beta-hemolytic streptococci resistant to this preparation. In beta-hemolytic streptococcus infections, treatment should be maintained for ten days to prevent the development of rheumatic fever or glomerulonephritis.

Erythromycin estolate has proved to be very effective in pneumococcus pneumonia and in acute bronchitis with pneumococci on culture. Bronchopneumonia and otitis media in children have responded well to its use.

The antibiotic has been used very successfully in staphylococcus infections. Good therapeutic results have been obtained in soft-tissue infections, abscesses, cellulitis, carbuncles, wound infections, and furunculosis.

In serious staphylococcus infections, erythromycin preparations should be used only in combination therapy with other antimicrobial agents. As is the case with any treatment regimen used in these severe conditions, surgical procedures should be performed when indicated, and large dosages of the antimicrobial agents should be employed. In this fashion, Ilosone has been effective in staphylococcus pneumonia, osteomyelitis, septicemia, empyema, and meningitis.

Multiple 500-mg. doses of the drug have been useful in gonorrhea and syphilis. Since penicillin is the drug of choice for the treatment of syphilis and gonorrhea, erythromycin estolate should be employed for these infections only in patients with a history of penicillin allergy. Also, other infections due to susceptible bacteria in patients known to be hypersensitive to penicillin or other antibiotics may be considered for treatment with Ilosone.

Contraindications: Ilosone is contraindicated in patients with a known history of sensitivity to this drug and in those with pre-existing liver disease or dysfunction.

Side-Effects: Data obtained from seven years' use of propionyl erythromycin ester and erythromycin estolate (Ilosone) indicate that hepatic dysfunction with or without clinical jaundice may occur during or following courses of therapy with the drug.

Changes in liver function tests in such cases have been indicative of intrahepatic cholestasis. The symptoms appear to be the result of a form of sensitization. The initial symptoms have appeared in some cases after a few days of treatment but generally have followed one or two weeks of continuous therapy or several courses of the drug. Symptoms reappear promptly if the drug is readministered to sensitive patients, usually within forty-eight hours. Eosinophilia was noted in peripheral blood counts. The findings readily subsided without apparent residual effects when treatment was discontinued. Recovery was delayed in one reported instance. The physician indicated in this case that either drug-induced jaundice or viral hepatitis may have been responsible for the findings.

In one clinical study involving ninety-three patients treated with the antibiotic, three cases of jaundice were observed and an additional eleven cases developed some changes in liver function tests. Three of the patients had abnormal liver function tests a second time on readministration of the drug.

Even though it is assumed that not all cases of jaundice have been reported, it seems clear that the number is small compared with the amount of drug that has been used. Reported cases have included persons in whom there had been administered other drugs known to be associated at times with hepatic side-effects and cases in which the presence of viral hepatitis or other disease may have been responsible for the findings. In some of the cases, associated gastro-intestinal symptoms simulated the colic of biliary tract disease. In other instances, clinical symptoms and results of liver function tests resembled findings in extrahepatic obstructive jaundice. It appears that the occurrence of jaundice after administration of Ilosone is infrequent, but further investigations are being made to estimate its incidence more accurately.

In those cases mentioned above in which jaundice appeared to be definitely related to use of the drug, laboratory findings were characterized by increased direct-reacting bilirubin, elevated alkaline phosphatase levels, negative or weakly positive cephalin flocculation and thymol turbidity tests, elevated serum glutamic oxalacetic transaminase levels, peripheral eosinophilia, and normal cholecystograms.

Individual idiosyncrasy seems evident since jaundice has not been reported in other patients taking prolonged courses of the medication. Patients with chronic infection have been given 1 to to 2 Gm. of the drug daily for periods of two to six months, and patients with rheumatic fever have taken prophylactic doses of 0.5 Gm. daily for two years without difficulty. In one group of 144 patients who received the drug daily for two years, no jaundice was noted. It was of interest that members of six of these patients' families, who were not taking the drug, had episodes of jaundice during the study period.

Transaminase and serum alkaline phosphatase levels were determined in a group of fifty-four adults and children who took 250 mg. of Ilosone daily for an average of sixteen months as rheumatic fever prophylaxis. The results were compared with those of a similar group of forty-four patients who received penicillin. There were no cases of jaundice in either group. Elevation of SGPT and serum alkaline phosphatase levels during the course of treatment was observed in one patient treated with Ilosone and in two patients treated with penicillin. Seven other patients in the group receiving Ilosone and four others in the penicillin group showed elevations in one of the tests at some time during administration of the drugs.

Very satisfactory therapeutic results, without toxicity, were reported in 102 pediatric patients who received short-term (ten-day) courses of Ilosone in the treatment of streptococcus infections. Results of liver function tests in these patients were comparable to those in a similar control group who had received penicillin.

Gastro-intestinal disturbances not associated with hepatic effects are observed in a small proportion of individuals as a result of a local stimulating effect of the medication on the alimentary tract; however, the normal intestinal gram-negative bacterial flora is not appreciably altered by erythromycin drugs.

Although allergic manifestations are uncommon with the use of erythromycin, there have been occasional reports of urticaria, skin eruptions, and, on rare occasions, anaphylaxis.

Administration and Dosage: Ilosone is administered orally.
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Ilosone Drops
Ilosone, 125, for Oral Suspension

For infants and for children under twenty-five pounds of body weight, the usual dosage is 5 mg. per pound every six hours; for children twenty-five to fifty pounds, 125 mg. every six hours. (Tablets Ilosone Chewable should be chewed or crushed and swallowed with water.)

For adults and for children over fifty pounds, the usual dosage of Ilosone is 250 mg. every six hours.

For severe infections, these dosages may be doubled.

When larger doses are indicated, parenteral erythromycin therapy should be considered.

In the treatment of syphilis, the recommended total dosage is 20 to 30 Gm. given in divided doses for a period of ten to fifteen days. Close follow-up of the patient is necessary since erythromycin drugs have not had adequate evaluation in all stages of syphilis. Examinations of spinal fluid are recommended as part of the follow-up therapy.

For gonorrhea, 500 mg. four times a day for four days are recommended.[1] In the treatment of gonorrhea, patients with a suspected lesion of syphilis should have a dark-field examination before receiving antibiotics, and monthly serologic tests should be made for a period of three months.

How Supplied: Pulvules Ilosone, Capsules, N.F., 125 and 250 mg. (equivalent to base), in bottles of 24 and 100.

Tablets Ilosone Chewable, N.F., 125 mg. (equivalent to base), in bottles of 50.

Ilosone Drops, 5 mg. (equivalent to base) per drop, in 10-cc.-size packages, with dropper calibrated at 25 and 50 mg.

Ilosone, 125, for Oral Suspension, N.F., 125 mg. (equivalent to base) per 5-cc. teaspoonful, in 60 and 150-cc.-size packages.

References: 1. Griffith, R. S., and Black, H. R.: Am. J. M. Sc., *247:*69, 1964. 2. Griffith, R. S., and Black, H. R.: Antibiotics & Chemother., *12:*398, 1962. 3. Hirsch, H. A., Pryles, C. V., and Finland, M.: Am. J. M. Sc., *239:*198, 1960.

Additional information available to physicians upon request.
Eli Lilly and Company, Indianapolis, Indiana 46206.

700121

Urges County Medical Societies Take Leadership in Family Life Education

"Definitely, Family Life Education can be a county medical society project."

That evaluation is voiced by Eleanor Skufis, M.D., Adrian, one of the advisors to the active MSMS Family Life Education subcommittee. The MSMS Committee has been urging the component societies to answer the many challenges.

"The interested county medical society must involve doctors, teachers, school administrators and parents. All these people combine to make a good program. The teachers and parents must know what the physician is going to teach, and the parent must know his right to control his child's participation in the program."

Doctor Skufis continued: "No community that I know of has rejected the idea of sex education, nor has anyone said 'this is the church's job, nor the schools.'" "The physician can't prescribe a sex education program for the whole state, because each community's needs are different. But he can do a lot in his own area."

* * *

THE INTERESTED COUNTY society should work with the county health department and the school nurses, suggested Doctor Skufis, former Lenawee County health director. She continued:

Working with a classroom teacher, Eleanor Skufis, M.D., left, confers many times with many classes in the Adrian schools and also at Adrian College. In this article, she urges the county medical societies to fill its responsibilities to provide family life educaton information and insights to students.

"The local health department has access to teaching materials and film libraries and often has already been doing something in the field of sex education. The physicians should work with the local health department to encourage them, to ask their help in setting up a program, in short, to be in close contact because sex education is a community concern."

How does the doctor who sees a need for family life and sex education in his community get involved?

"Besides what we have mentioned about working with other people in the community and knowing how to communicate about sex, it's also important that he do some reading. First I'd recommend the AMA series on sex education. They're good for the doctors and the parents. I know several doctors who have used them for their children and they swear by them.

"Another good booklet," Doctor Skufis said, "is a simple one called 'The Gift of Life,' available from the Michigan Department of Health in Lansing. A good series of six, for the doctor's office, was written by Bernard Greenblat, MD, for a $1.50 each. They are available from Budlong Press Company, 5428 N. Virginia Avenue, Chicago 60625."

Doctor Skufis, a member of the Michigan Youth Commission, expressed the following philosophy: "The physician who takes an active interest in establishing good sex education programs in his community is acting not only as a healer of present sickness, but he is also insuring the future health and happiness of his community. The feelings about sex instilled into a child of five can be causing unhappiness in that child's marriage as an adult of twenty-five.

"On the other hand, the child who learns to love and respect his own sexuality and the sexuality of others will have positive feelings toward himself and others and will pass those feelings onto his children when he becomes a parent. The physician who works to accomplish healthy attitudes towards sex is doing something valuable for countless generations of people."

* * *

THE DOCTOR, as a sex educator is in an ideal position, Doctor Skufis believes. "Provided of course that he can talk to his own children.

"If he can communicate about sex, the doctor is your man because the kids trust him and look to him for information of this kind," she said. "In general the kids feel that the doctor will be truthful and has the facts. It is also a good way for the doctor to communicate the idea that he is interested in them not just when they are sick but all the time.

"The relationship which the physician builds with the people by doing sex education makes for a more desirable patient in the end," she continued. "This makes it easier for the patient to come to the doctor later when problems come up."

Doctor Skufis also believes that the doctor who does sex education must be prepared to be truthful. "He can't say, 'I can't answer that because it's against the state law.' My kids would say to me if there's something I need to know and it's against the law for you to tell me, why haven't you changed the law? The doctor who goes into the classroom must be honest with the kids."

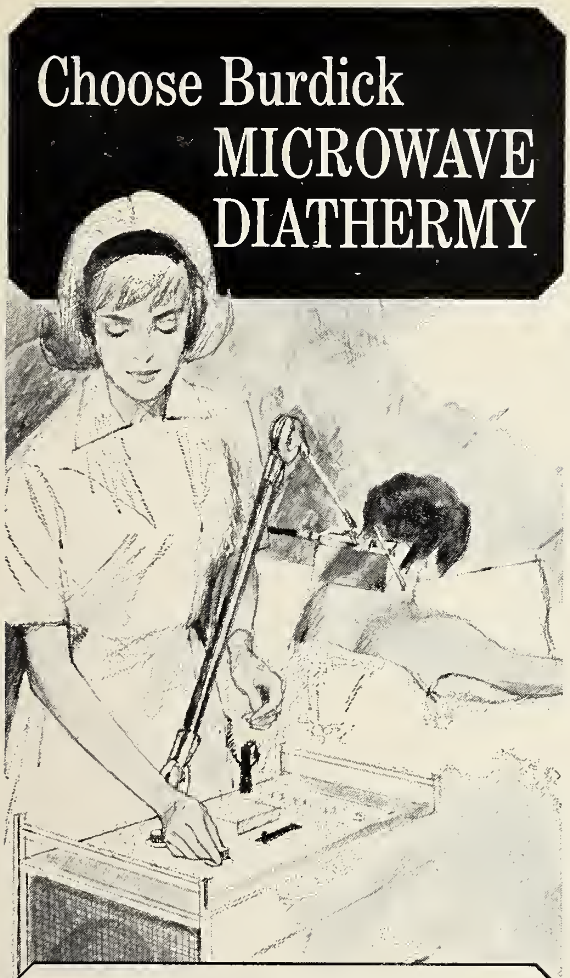
Doctor Skufis reports that, "The questions kids ask are practical, almost always prompted by what they have just read in the popular magazines. For example, an eighth grade girl asks 'What is the pill, how does it work?' This age group can understand an explanation that the 'pill' is a preparation of hormones not unlike those produced by their body, and act on the ovulatory cycle, pointing to a chart or teaching aid. They can understand that the pill has more than one use but the most usual one is as an aid in family planning for married women. The doctor must emphasize that these very potent hormones must be prescribed by a doctor, taken on a very exact schedule, and the patient must remain under the doctor's supervision while taking these hormones. Another thing the doctor should realize," she said, "is that long after he leaves the classroom the kids will be asking the teacher questions. The doctor and teacher should be in contact so the teacher can handle the questions after the doctor leaves. For a doctor to show a film to a group of parents or teachers or students is a good way to start discussion. Then you have a common ground. If you just start talking to them cold you don't know what they know."

AN EXCELLENT film for parents and teachers is 'Parent to Child About Sex,' produced by Frederick Margolis, M.D., of Kalamazoo. It can be rented from the audio-visual department at Wayne State University."

"Ideally the greater part of sex education, as the MSMS Family Life Committee constantly emphasizes, is education about the values of sexuality: respect for one's own sexuality and the sexuality of others, the positive value and meaning of sex in human life, the awareness that sexuality is not something tacked onto the human personality but a radical part of what it means to be a human person.

"And finally, the widest meaning of sex education, is establishing the conditions in which a person will come to a realistic self concept about who he or she is as a man or a woman. No person, agency, or program can ever completely teach this to someone, but a healthier climate of communication and information about human sexuality can be helpful to the young person as he struggles to discover and establish his identity as a man or woman."

Two Chinese Nationalists, concerned with creating industries to supply jobs for retired servicemen of the Republic of China on Taiwan recently visited S. J. Tutag and Company of Detroit, manufacturer of pharmaceutical products. The six-hour visit, during a nationwide tour, was under the auspices of the International Visitors Department of the International Institute. Shown with Richard Teagan, vice president of S. J. Tutag and Company (far left), are: Colonel Hsiao Chang Yen, director of the Engineering Agency of the Vocational Assistance Commission for Retired Servicemen, Taipei, Taiwan; Chairman Tsu-yu Chao, of the Vocational Assistance Commission; LaVerne Baldwin, U.S. Department of State, former Consul-General in Japan; and Walter Curley, vice president in charge of sales, Cord Laboratories, a wholly-owned subsidiary of S. J. Tutag and Company.



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"Matter of Life Or Death"

That first cigarette "may be a matter of life or death," warns the Michigan PTA and the National Congress of Parents and Teachers in its new program on smoking and health.

Michigan PTA leaders are distributing a pamphlet to parents of seventh- and eighth-grade children sharing the information about smoking and health that PTA leaders believe all parents should know.

"The PTA says it's time to push the action button against teenage smoking," declares A. B. Haist, President of the Michigan PTA.

The Michigan PTA in its smoking-health study project is cooperating with the Michigan Council on Smoking and Health. The Council is a joint effort of the Michigan State Medical Society and 11 other health organizations.

"We owe it to our children's future health and long life to do everything possible to prevent them from starting to smoke," he stresses.

The goal of the program will be to deliver information on the hazards of smoking to parents of junior-high school students — children at a particularly vulnerable age, Mr. Haist explains.

Studies reveal, he said, that every day nearly 4,500 people light their first cigarettes. Studies also show that among high school students, one in three smokes, and that half the nation's teenagers are regular smokers by age 18.

LAUDS AMA EFFORTS

"It is easy to criticize the national organization of the medical profession as a collection of reactionary diehards because of their individual and collective opinion regarding a legislative matter, while forgetting that the same organization — the American Medical Association — has guided, inspired, motivated and directly or indirectly supervised the education of members of a profession that has extended the life expectancy of Americans from 47 years to slightly over 70 years since the turn of the century."

AMA President, Charles L. Hudson, M.D.
In a speech to the Economic Club of Detroit, 1967

WANTS MORE PARKING

One patient at the University of Michigan Medical Center recently suggested that the hospital "should dig up the grass and stretch out the parking spaces" to improve service at the hospital. The advice was solicited through a questionnaire distributed by the hospital as a project to improve its service.

viewpoints

SOUTH VIETNAMESE CIVILIANS NEED MORE MEDICAL AID

BY HIRA E. BRANCH, M.D., CHAIRMAN
MSMS INTERNATIONAL HEALTH COMMITTEE

While the news gives us an almost daily scorecard on the battle casualties and bombs in Vietnam, a tragic part of the war goes relatively unnoticed — the terrible suffering of Vietnamese civilians due to both war injuries and disease.

There are no statistics on civilian casualties in Vietnam. Those of us who have been there need none. We have seen people, innocent people, with burned bodies and shattered limbs. The sight is not easy to forget.

Whatever our convictions about the war in general, as physicians we must unite to speak out against the inadequate level of medical care being given Vietnamese civilians.

SOME WILL ARGUE that we are giving too much foreign aid already. But this view misses the simple fact that in Vietnam we have a military presence which is growing larger every day and that if we choose to wage war in the country we have a responsibility to do all we can to insure the health and safety of the civilians who are innocently caught in the conflict.

What are the facts? The total medical budget, everything from bricks and mortar to vaccines, is .02 percent of the total United States spending in Vietnam for 1967.

Fifty million dollars of the Vietnam budget goes for civilian medical care. This may sound impressive, but in a land which has suffered 200,000 deaths in the last ten years (approximately 200,000 United States soldiers were killed in World War II), a land which has suffered one million casualties in the last 10 years, the medical budget amounts to $3 per year for each South Vietnamese civilian. This budget would not even support an all-out immunization program in Vietnam. If only 1 percent of the budget were devoted to civilian medical care, it would have to be increased to $250 million. Even this would not be nearly enough.

As Alfred Swanson, M.D., member of the International Health Committee, has said, "The level of medical care in Vietnam is probably equivalent to that of our Civil War. Hospital facilities are unbelievably inadequate. To describe a hospital facility in this country is simply to state scandalous in the land of the presence and commitment of the world's greatest power."

THE COUNCIL recently agreed that as physicians we should speak on this subject to the public. Michigan physicians who have served in Vietnam have experienced the friendship and good will which good medical care can evoke. The war of winning the hearts of the people of Vietnam is as important as the military war because military victory without the support of the Vietnamese people would simply be conquest and not the kind of victory we are seeking.

As physicians we are healers. Vietnam needs many healers and much healing. It is wise to be profligate with our bombs and bullets and sparing with our bandages and hospital beds?

ON AIR POLLUTION

BY BRADLEY M. HARRIS, M.D.
MSMS PRESIDENT-ELECT

The spectre is easy to see. It coats our skies and settles on our homes, our lawns, our streets, and our clothes. More important and serious is its effect on our health. Industry continues to expand and become more sophisticated, adding exotic pollutants. These in time are altered by sunlight into weird new chemicals that no one can identify. The two-thirds of our population living in urban areas face an ever-multiplying hazard.

The problem is no mystery. We know its causes and its effects, and we can alleviate both. As physicians we have a community responsibility both individually and collectively through our professional and civic organizations to accept the challenge of helping clean the air we breathe. The AMA has an antipollution educational program underway and urges that every physician familiarize himself with his community's regulations on air pollution and their enforcement.

Michigan physicians are concerned that the National Center for Air Pollution Control ranks Detroit as the third most seriously polluted city in the nation, exceeded only by New York and Chicago. The envelope of air surrounding our planet is not a renewable resource, and we seem to be pursuing a course to exhaust it. The medical fraternity, the ultimate recipients of victims whose exposure has progressed to the symptomatic stage (at which point the only help may be palliative) has both the opportunity and responsibility to participate actively in programs now underway and to eliminate the various sources. The most effective approach is always the community or so-called grass roots level.

APPEALS FOR UNITY

A challenge for greater unity in the medical profession was made recently by Roy J. Gerard, M.D., President of the Bay-Arenac-Iosco County Medical Society. He made these comments: "Unity should be the guideline of our profession.

"It seems that there are many who would like to see our profession split apart, to see us quibble over fees, over status, to see specialist versus specialist, generalist versus specialist, hospital versus doctor, etc. In reality, we are now in Phase 3 of the Administration's plan of making the old people of our nation dissatisfied with Medicare and placing the responsibility of its failure on our shoulders.

"Phase I: From July through September (of 1966) was planned to show the American people that Medicare could start without filling our hospitals to the brim with these over 65.

"Phase 2: Organized confusion, delays in payment, dissatisfaction over assignment.

"Phase 3: Blame the doctor for the mess of red tape — 'If it wasn't for the greedy doctors, the program would be successful.'

"So here we are, facing the new year with a great deal of uncertainty but Medicine has had problems before and has been able to overcome them.

"Those before us have worked hard and long in the interests of protecting the private practice of medicine and lessening the impact of governmental interference in medical practice. Can we meet the Challenge? I think we can but we must meet it as a unified profession for if we fall apart, so will the structure of the best medical care available in the world today.

"Above all, we must not lose sight of our goals, and our motivation to become doctors in the first place; we are here to fight sickness and disease, not the government. We must all pull together and remember that regardless of the form of delivery of health care that the highest quality of individual care must be our goal."

WHO AM I?

It is probable that the good and honorable physician almost daily considers the propositions "Who am I?" or "By what means do I exercise the tangible power I have over my patients?"

The following quotation summarizes it as succinctly as anything ever written:

"Honor thy physician with the honor due him;
For verily the Lord hath created him;
For from the Most High cometh healing;
And in the sight of great men he shall be exalted.
The Lord created medicines out of the earth;
With whom doth the physician heal a man
And taketh away his pain;
And let not a discerning man reject them.
Yes, there is a time
When in his hands is the issue of life;
For by his skill doth he make
Supplication unto the Lord;
That He may prosper him in giving relief
And send healing for the maintainance of life."
Ecclesiasticus XXXVIII

How many centuries ago were these words written? Every physician needs constantly to be aware of this awesome responsibility, even today.

B.L.M.

NOTED AND QUOTED

"No matter what your age or job in life, you are more mature if you have found a 'cause' in which to invest your time and money for some social good. Through it you can achieve an outstanding characteristic of emotional maturity — the ability to find satisfaction in giving."

—William Menninger, M.D.

"Because a man has a driver's license doesn't mean he is competent to drive an ambulance. After all he's not delivering goods, like a laundry man, but sick and injured people.

"Often he has vital decisions to make. Should a patient with a broken back be moved, or should more qualified help be sought? Is mouth-to-mouth respiration needed? Is the patient in shock? Can bleeding be controlled?

"Unless ambulance drivers understand such things, a life that could be saved might slip away. And yet many ambulance drivers don't even know the rudiments of first aid.

"What is obviously necessary is a program to develop personnel for civilian use similar to army medical corpsmen. They would either accompany ambulances or serve as ambulance drivers."

—Richard F. Manegold, M.D.
Director,
AMA Department of
Hospitals and Medical
Facilities

MSMS HISTORY BY DOCTOR STAPLETON ADDED TO LIBRARIES

Recipients have been generous with their praise upon receiving complimentary copies of *A Century of Service in Medicine,* the excellent history of the Michigan State Medical Society written by MSMS Historian William J. Stapleton, Jr., M.D., Detroit.

As a public relations project, copies of the book are being distributed to colleges, professional associations, museums, newspapers, libraries, and others.

The book is still available to interested MSMS members for $2.00, the cost of printing the handsome 56-page, hardbound book.

Following are excerpts from some typical letters of appreciation:

"Thank you for your thoughtfulness in sending us a copy of Doctor Stapleton's fine volume. It will indeed be valuable to us."

—Derick Daniels
Detroit Free Press

"On behalf of our students and faculty, I want to thank you for *A Century of Service in Medicine.* We will make this valuable book part of our permanent collection."

—David L. Reich
Director of Learning Resources
Monroe Community College

"Thank you for sending us a copy of *A Century of Service in Medicine.* It will be a useful addition to our reference library.

—Tom L. Mercy
Editor
The Press, Ypsilanti

"The faculty and students of Lawrence Institute of Technology wish to thank you for your thoughtfulness in sending us a copy of your MSMS history. Our students will enjoy this volume for many years to come."

—H. G. Williams
Director, Library
Lawrence Institute

"Please accept this expression of sincere appreciation for the very fine publication which you so thoughtfully sent to the MEA. We will be very proud to give this a prominent place in our professional library."

—E. Dale Kennedy
Executive Secretary
Michigan Education Association

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"When I couldn't even smell corned beef and cabbage, I decided it was time for you, Doc."

Maybe he doesn't know when he's well off. But you might want to prescribe long-acting Novahistine LP anyway.

Two tablets in the morning and two in the evening will usually provide day and night relief by helping to clear congested air passages for normal, free breathing. Novahistine LP is formulated to provide continuous therapeutic effect for 8 to 12 hours. The decongestant ingredients help restore normal mucus secretion and ciliary activity—physiologic defenses against infection of the respiratory tract.

Use cautiously in individuals with severe hypertension, diabetes mellitus, hyperthyroidism or urinary retention. Caution ambulatory patients that drowsiness may result. Each Novahistine LP tablet contains: phenylephrine hydrochloride, 25 mg., and chlorpheniramine maleate, 4 mg.

NOVAHISTINE® LP

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Jack M. Stack, M.D., second from left, of Alma, receives a plaque of recognition as Gratiot County Republican Party finance chairman in appreciation for meeting the 1966 quota. Left to right are Senator Thurston Morton, Kentucky; Doctor Stack; State Senator Emil Lockwood, St. Louis, and Governor Romney.

Seek Patients for Study

The cooperation of physicians is requested in a study of patients with either hyper- or hypoparathyroidism in conjunction with developing a practicable immunoassay for parathyroid hormone being conducted by the Metabolic Diseases Branch of the National Institute of Arthritis and Metabolic Diseases at the Clinical Center, National Institutes of Health, Bethesda, Maryland.

Of interest for this study are patients with kidney stones and/or bone demineralization in association with high serum calcium and/or low serum phosphate. Patients with hypoparathyroidism (congenital or following extensive thyroid surgery) having low blood calcium and high serum phosphorous are also needed.

Physicians interested in having their patients considered for the study may write or telephone: Gerald D. Aurbach, M.D., Clinical Center, Room 9-D-14, National Institutes of Health, Bethesda, Maryland 20014; Telephone: 656-4000, Ext. 65051. —Announcement, Clinical Center, NIH, April 1966.

HONORED BY JAYCEES

Grand Haven's Young Man of the Year for 1967 is Jack A. Henderson, M.D., who was given the Distinguished Service Award by the Grand Haven Jaycees. Doctor Henderson is active in many community service organizations as well as medical society groups.

Tandearil®
oxyphenbutazone

Therapeutic Effects: Tandearil is a nonhormonal compound which may rapidly resolve inflammation and help restore normal joint function. Its action does not affect pituitary-adrenal function or impair immune responses. Its value in osteoarthritis is especially noteworthy because this disorder responds inconsistently to steroids and is often resistant to salicylates. Further, indomethacin is limited only to osteoarthritis of the hip, whereas oxyphenbutazone is effective in all forms of the disease.

Contraindications: Edema; danger of cardiac decompensation; history or symptoms of peptic ulcer; renal, hepatic or cardiac damage; history of drug allergy; history of blood dyscrasia. The drug should not be given when the patient is senile or when other potent drugs are given concurrently.

Warning: If coumarin-type anticoagulants are given simultaneously, watch for excessive increase in prothrombin time. Pyrazole compounds may potentiate the pharmacologic action of sulfonylurea, sulfonamide-type agents and insulin. Carefully observe patients receiving such therapy. Use with great caution in the first trimester of pregnancy.

Precautions: Obtain a detailed history and a complete physical and laboratory examination, including a blood count. The patient should be closely supervised and should be warned to report immediately fever, sore throat, or mouth lesions (symptoms of blood dyscrasia); sudden weight gain (water retention); skin reactions; black or tarry stools or other evidence of intestinal hemorrhage. Make regular blood counts. Discontinue the drug and institute countermeasures if the white count changes significantly, granulocytes decrease, or immature forms appear. Use greater care in the elderly and in hypertensives.

Adverse Reactions: The most common are nausea, edema and drug rash. The drug has been associated with peptic ulcer and may reactivate a latent peptic ulcer. Infrequently, agranulocytosis, or a generalized allergic reaction may occur and require withdrawal of medication. Stomatitis, salivary gland enlargement, vomiting, vertigo and languor may occur. Leukemia and leukemoid reactions have been reported but cannot definitely be attributed to the drug. Thrombocytopenic purpura and aplastic anemia may occur. Confusional states, agitation, headache, blurred vision, optic neuritis and transient hearing loss have been reported, as have hyperglycemia, hepatitis, jaundice, and several cases of anuria and hematuria. With long-term use, reversible thyroid hyperplasia may occur infrequently. Moderate lowering of the red cell count due to hemodilution may occur.

Dosage in Osteoarthritis: The initial daily dosage in adults is 300-600 mg. in divided daily doses. When improvement occurs, dosage should be decreased to the minimum effective level; this should not exceed 400 mg. daily, and is often achieved with only 100-200 mg. daily.

For complete details, please refer to full prescribing information. 6562-VI(B)R

Availability: Tablets of 100 mg.

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Geigy

Tandearil®
oxyphenbutazone

helps osteoarthritic joints move again

	3 out of 4 osteoarthritics completely or markedly improved
Sperling, I.L.: 3 Years' Experience with Oxyphenbutazone in the Treatment of Rheumatic Disorders, Applied Therapeutics 6:117, 1964.	76.9% of 407 patients
Watts, T.W., Jr.: Treatment of Rheumatoid Disorders with Oxyphenbutazone, Clin. Med. 73:65, 1966.	84.6% of 39 patients

Please see adjoining page for brief prescribing summary

TA-4919 PC

Why these 7 patients with moderate to severe anxiety may respond better to Mellaril

1. The agitated patient.
Anxiety—particularly that beyond the range of minor tranquilizers—frequently is expressed as gross motor restlessness, fidgetiness and purposeless movements, and may erupt into aggressive behavior. Mellaril is almost a specific for those patients whose anxiety follows such a pattern.

2. The psychosomatic patient.

The family physician is rarely given the diagnostic luxury of a classic, textbook "anxiety state." Most often he must probe for anxiety masked by a functional disorder—or which exacerbates a somatic problem. Double-blind evaluations have demonstrated that Mellaril can be a significant adjunct in the treatment of such patients.

. The patient under ituational stress.

ellaril helps the patient deal with
tresses of everyday life. Nonhabitu-
ting, it can be given for extended pe-
iods of time. It does not "separate"
he patient from practical problems
nd pressures, does not induce eupho-
ia or a fuzziness which can compromise the ability to cope with realities. Rather, it helps the patient move more competently in his daily world by eliminating useless tension, by allowing him to conserve emotional resources and energies, and to direct them against the problems really worth worrying about.

4. The menopausal patient.

The woman who sees change of life as the end of useful life requires support from both family and family physician. Whether the psychological impact of menopause is directly related to hormonal changes, or merely coincidental, is debatable, but estrogenic therapy is frequently inadequate. Mellaril is a useful aid for these patients and, alone, or in combination with reduced estrogen dosage, will help ease the menopausal misery.

5. The previously hospitalized psychiatric patient.

Such a patient may still require the type of medication he has been accustomed to, but because he is no longer in a controlled setting the acceptable level of adverse reactions must be lower. In such circumstances Mellaril is perhaps the drug of choice.

6. The agitated geriatric.

Tranquilizer therapy in the elderly patient always involves special (or at least accentuated) problems: the possibility of drug-induced ataxia, hypotension or depression, for example, assumes an additional significance. These reactions have rarely been observed in geriatric patients treated with Mellaril.

7. The constantly returning patient.

The anxiety patient who has not responded to a minor tranquilizer is not very likely to benefit from your minor tranquilizer of second choice. A major tranquilizer, such as Mellaril, may be indicated in such patients.

Contraindications: Severely depressed or comatose states from any cause, and in association with or following MAO inhibitors; severe hypertensive or hypotensive heart disease.
Precautions: Hypersensitivity reactions (e.g., leukopenia, agranulocytosis) and convulsive seizures are infrequent. Pigmentary retinopathy has been observed where doses in excess of those recommended were used for long periods of time. May potentiate central nervous system depressants, atropine, and phosphorus insecticides. Where complete mental alertness is required, administer the drug cautiously and increase dosage gradually. In addition, orthostatic hypotension (especially in female patients) has been observed. Epinephrine should be avoided in treatment of drug-induced hypotension.
Side Effects: Pseudoparkinsonism and other extrapyramidal disorders are infrequent; drowsiness, especially in high doses early in treatment, may occur; nocturnal confusion, dryness of the mouth, nasal stuffiness, headache, peripheral edema, lactation, galactorrhea, and inhibition of ejaculation are noted on occasion; photosensitivity and other allergic skin reactions may occur but are extremely rare.
Before prescribing, see package insert for full product information.

in moderate to severe anxiety, 25 mg. t.i.d.

Mellaril®
(thioridazine)

SANDOZ

Bartholin's gland
Periurethral glands
Cervical glands
Flagyl®.....
brand of
metronidazole
Seminal vesicles
Bladder
Prostate gland

Destroys Trichomonads Wherever They Are

Flagyl seeks out the sites where trichomonads hide. Only a systemic agent can. Flagyl does, selectively and effectively.

Flagyl destroys trichomonads in the inner crypts, glands and cavities of the genitourinary tract in both women and men. Consequently, Flagyl is capable not only of curing trichomoniasis in women but also of preventing reinfection.

Correctly used, with due attention to repeat courses of treatment for resistant, deep-seated invasion and to the presumption of reinfection from male consorts, Flagyl has repeatedly produced up to 100 per cent cure in large series of patients.

When the diagnosis of trichomoniasis is positive, Flagyl is positive.

Dosage and Administration – In *women:* one 250-mg. oral tablet three times daily for ten days. A vaginal insert of 500 mg. is available for local therapy when desired. When used, one vaginal insert should be placed high in the vaginal vault each day for ten days; concurrently two oral tablets should be taken daily.
In *men* in whom trichomonads have been demonstrated: one 250-mg. oral tablet twice daily for ten days.

Contraindications – Pregnancy; disease of the central nervous system; evidence or history of blood dyscrasia.

Precaution–Complete blood cell counts should be made before, during and after therapy, especially if a second course is necessary.

Side Effects–Infrequent and minor side effects include nausea, metallic taste, furry tongue and headache. Other effects, all reported in an incidence of less than 1 per cent, are diarrhea, dizziness, vaginal dryness and burning, dry mouth, rash, urticaria, gastritis, drowsiness, insomnia, pruritus, sore tongue, darkened urine, anorexia, vomiting, epigastric distress, dysuria, depression, vertigo, incoordination, ataxia, abdominal cramping, constipation, stomatitis, numbness of an extremity, joint pains, confusion, irritability, weakness, flushing, cystitis, pelvic pressure, dyspareunia, fever, polyuria, incontinence, decreased libido, nasal congestion, proctitis and pyuria. Elimination of trichomonads may aggravate candidiasis.

SEARLE *Research in the Service of Medicine*

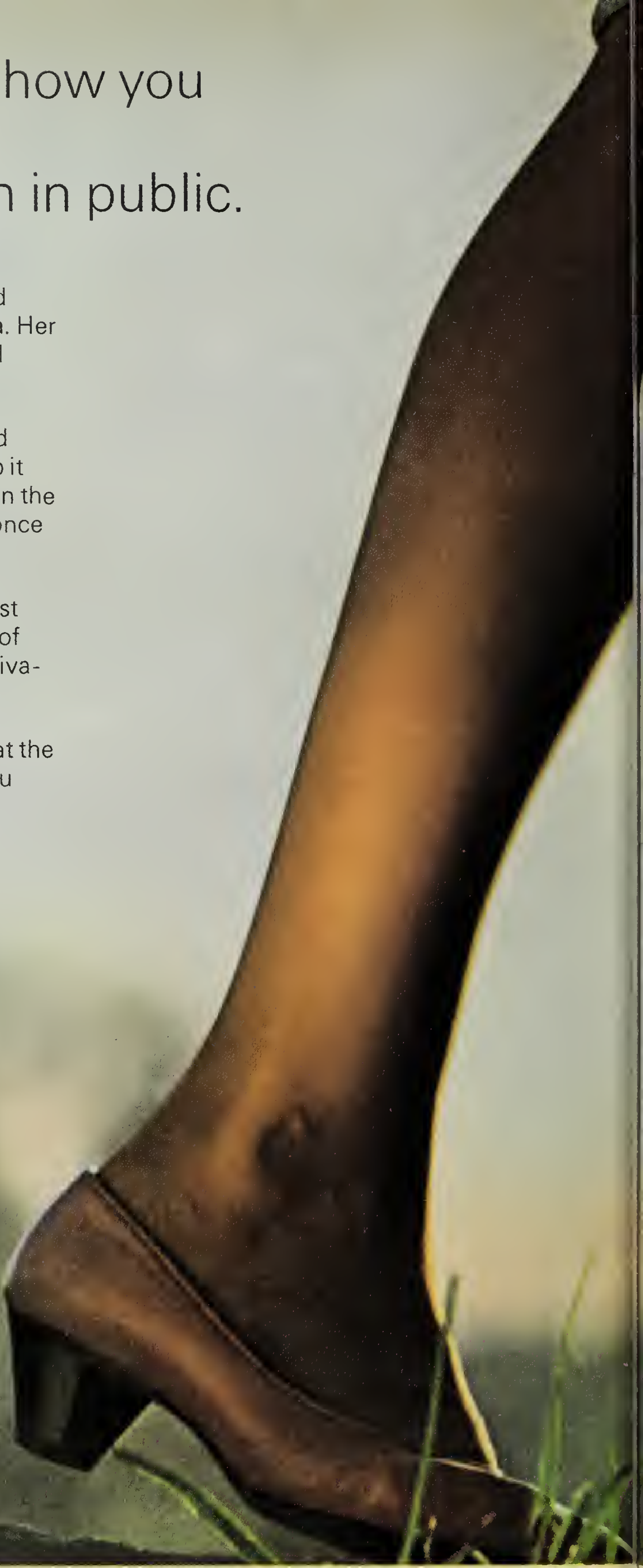
Did Dorothy Larson show you her ankles in private? Now she shows them in public.

Your office examination would have confirmed that Mrs. Larson was up to her knees in edema. Her heart was beginning to fail. And her ankles had disappeared under an inch of salty water.

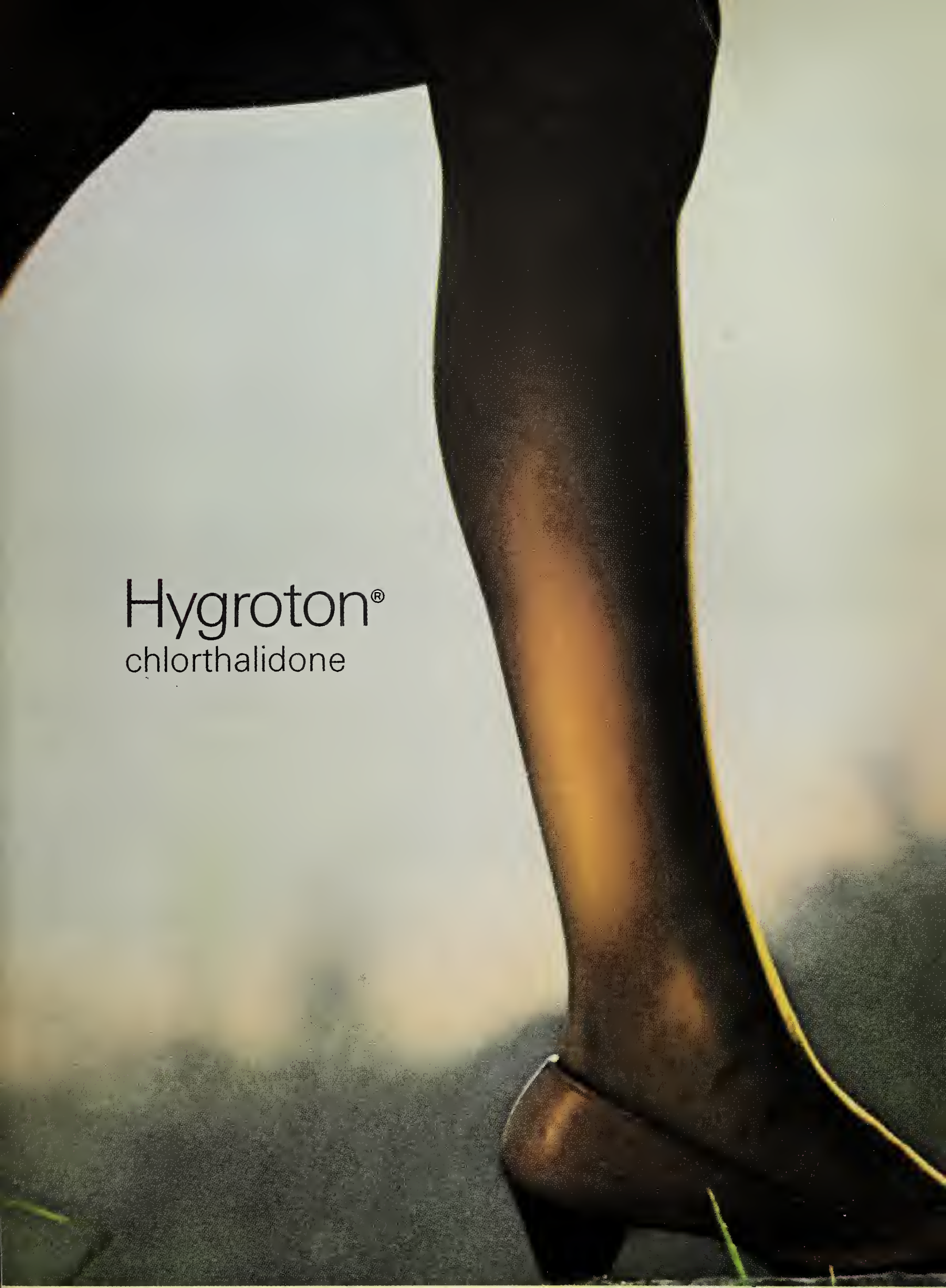
Along with digitalis, you might have prescribed Hygroton. To get rid of the edema. And to keep it from coming back. And you prescribe Hygroton the same way you usually prescribe digitalis: just once a day.

Tablet for tablet, Hygroton is just about the most effective diuretic going. And it costs a fraction of what Mrs. Larson would have to spend for equivalent therapy with short-acting diuretics.

In fact, Hygroton is an awfully nice way to treat the Mrs. Larsons in your practice. Just tell them you can get their ankles back at half price.



Indications: Hypertension and many types of edema involving retention of salt and water.
Contraindications: Hypersensitivity and most cases of severe renal or hepatic disease.
Warning: With administration of enteric-coated potassium supplements, the possibility of small bowel lesions should be kept in mind.
Precautions: Reduce dosage of concomitant antihypertensive agents by at least one-half. Discontinue if the BUN rises or liver dysfunction is aggravated. Electrolyte imbalance and potassium depletion may occur; take special care in cirrhosis or severe ischemic heart disease,



d in patients receiving corticosteroids, ACTH, or digi-
is. Salt restriction is not recommended.
de Effects: Dizziness, weakness, nausea, vomiting,
perglycemia, hyperuricemia, headache, muscle cramps, postural hypotension, constipation, leukopenia, thrombocytopenia, agranulocytosis, impotence, dysuria, transient myopia, skin reactions, including urticaria and purpura, epigastric pain, or G.I. symptoms after prolonged administration.

Average Dosage: One tablet (100 mg.) with breakfast daily or every other day.

Availability: Tablets of 100 mg. 6524-V(B)

For full details, see prescribing information.

...so you might say Hygroton is good public relations for Mrs. Larson

Because it gets her *out* in public in the first place. At 43, Mrs. Larson worries about appearances and swollen ankles don't help.

But Hygroton's cosmetic effect is only half the story. Hygroton and digitalis therapy helps her get back in the swing of things. Gives her a second wind. Gets rid of the extra pillow she needed for a good night's sleep. Now she even likes to take walks. Just for the fun of it!

When her troubles began, Mrs. Larson thought they were the signs of the change of life. It's a change all right, but one you can treat. And you can count on Hygroton to help keep her in public instead of in the hospital.

See preceding pages for brief summary of prescribing information.

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The Fast, Accurate and Inexpensive method for the following tests — **True Glucose — Hemoglobin Test — Cholesterol Test — Ureanitrogen Test (B.U.N.) — Uric Acid Test.**

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Colombia Learns About Careers Mobile

". . . Gracias a los esfuerzos de las esposas de los doctores, la Michigan Healthmobile has relatado la historia somebre el progreso medico a unas 100,000 personas en 40 communidades durante el ano pasado."

That information about the Michigan Health Careers Mobile is being read by many in Colombia, South America, thanks to the American Medical Association.

A health newsletter in the Spanish language is being distributed now by the S. S. Hope hospital ship, in Colombia, telling about many efforts in the States in health education. The translation credits the wives of Michigan physicians for helping to sponsor the Healthmobile last year in 40 communities, where some 100,000 persons viewed the exhibits.

The Michigan Health Careers Mobile is a project of the Michigan State Medical Society and the Michigan Health Council to interest students in the opportunities in medicine and the other health careers.

MSU-COPPER COUNTRY COOPERATE

The new MSU College of Human Medicine will participate in a community health planning program with the Copper Country Health and Welfare Council. An agreement will provide for cooperative programs between the Council and MSU in Gogebic, Ontonagon, Houghton, Keweenaw, and Baraga counties.

MDPH Changes Certain Bacterial Agglutination Tests

The Michigan Department of Public Health announces that the Bureau of Laboratories has discontinued the Widal and certain other bacterial agglutination tests with patients' sera. The list of bacterial agents concerned is as follows. (1) *Salmonella typhi* O; (2) *Salmonella typhi* H; (3) *Salmonella paratyphi* A; and (4) *Salmonella paratyphi* B.

Tests will continue to be made upon request with patients, sera and the antigens *Brucella abortus* and *Pasteurella tularensis.*

Discontinuance of the Widal and allied tests is based on the fact that meager and often inaccurate information is obtained and, furthermore, that culture of feces and blood is far more accurate and rewarding.

URGES STUDY OF ROLES

It is timely to look again at the respective roles of the federal government and industry in medical research if we are to meet the great new health goals of the nation. Perhaps the single most important factor in medical research since 1950 has been the impressive growth of both federal government and private support and the developing patterns of interaction among the three parties in the health research community — government, the universities, and industry. In these complex, fast-moving times it is important to know, at least in general terms, who is doing what work and, of equal importance, the extent and kind of interplay there should be among government, the universities, and industry.

—John J. Powers, Jr.
President, Pfizer

U-M Professor Offers Views on Insurance

"Many a citizen is not yet aware of the extent of the inflation in costs because he hasn't had to pay a hospital bill himself," declared professor James N. Morgan, a program director at the University of Michigan's Survey Research Center, at a recent U-M conference.

What the consumer really wants, Morgan said, are "simple, open channels for getting care and paying for it." He needs a payment system that saves him from financial disaster while retaining his concern for the efficient use of expensive health-care resources, a system where he pays for part of everything, and which rewards him for preventive care and foresight.

Spreading of costs is essential, the economist said, if people are to pay for their own health care. This, he pointed out, makes insurance necessary. "But insurance can work well only if it covers nearly everyone and only if it does not extract an unreasonable fraction for its own operating costs," he added.

U-M Sesquicentennial Major Medical Events

The following chronologic list of programs concerns the University of Michigan Medical School programs which are planned specifically for or in conjunction with the Sesquicentennial Year. These programs are in addition to the continuous programming which is carried out each year by the various departments within the Medical School and the Department of Postgraduate Medicine.

SEPTEMBER 14-16 — Annual Meeting of the American Thyroid Association

SEPTEMBER 29 - OCTOBER 1 — Conference — American Academy of Child Psychiatry

OCTOBER 5-7 — Medical School Alumni Reunion

OCTOBER 9-13 — International Conference on Leukemia and Lymphoma

OCTOBER 27-28 — Regional Meeting, American College of Physicians

NOVEMBER 9-10 — Prognosis for Arthritis Research Today and Prospects for Tomorrow (30th Anniversary of Rackham Arthritis Research Unit)

NOVEMBER 15-17 — International Conference on "Fertility and Family Planning — A World View"

NOVEMBER 26-29 — Conference — "Genetics in Medicine," Sponsored by the American College of Physicians

MICHIGAN AUTHORS

Melvin L. Selzer, M.D., and Sue Weiss, M.S.W., both of Ann Arbor, "Alcoholism and Traffic Fatalities: Study in Futility," *The American Journal of Psychiatry,* January 1966.

Mercywood
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Mercywood Hospital is a private neuro-psychiatric hospital licensed by the Michigan Department of Mental Health. Mercywood specializes in intensive, multi-disciplinary treatment for emotional and mental disorders.

Accredited by the Joint Commission on Accreditation of Hospitals and the National League of Nursing. A full Blue Cross participating hospital.

Certified for: Medicare and M.A.A. programs.

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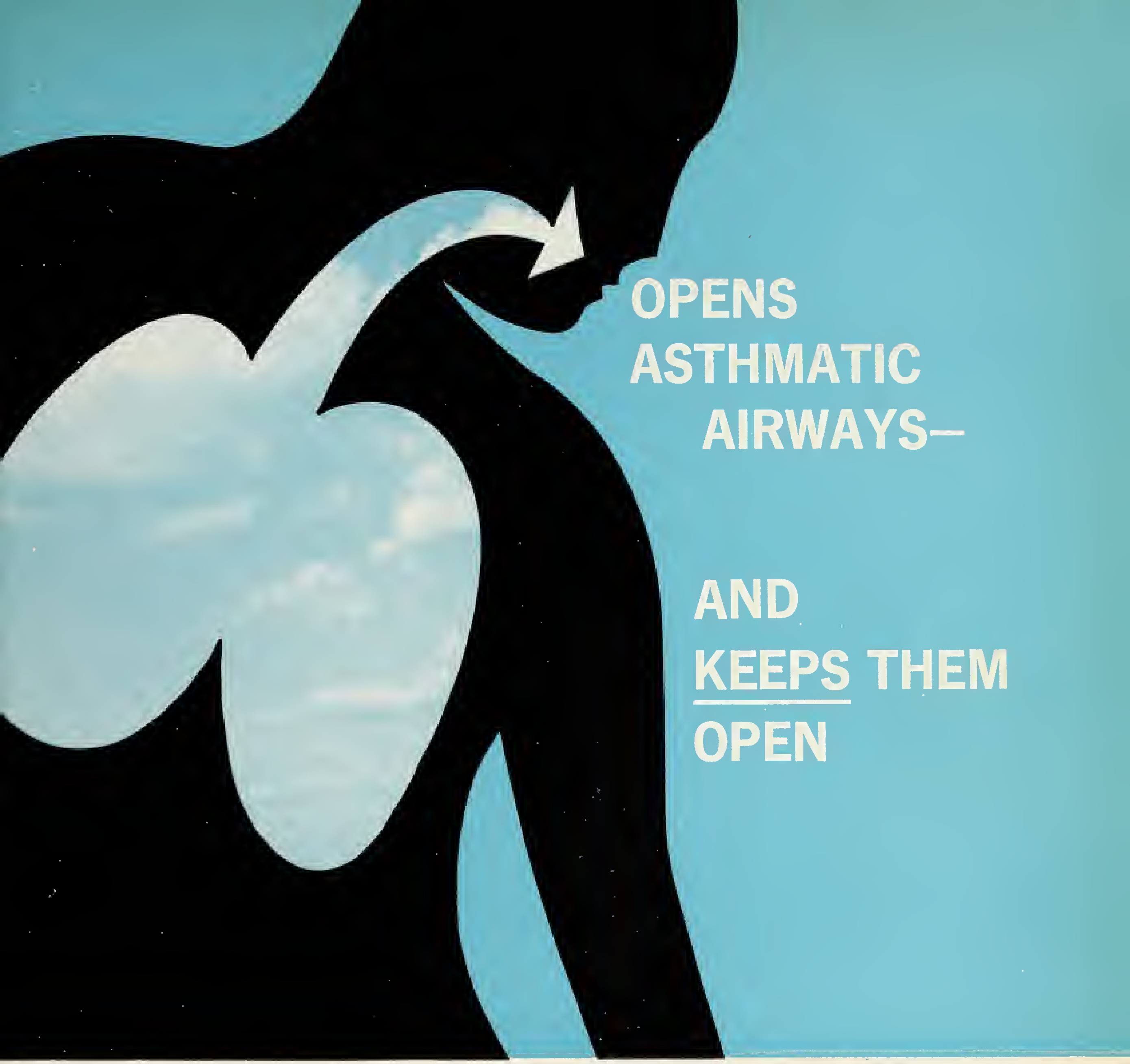

NUMA® **DURA-TABS**®
for *prolonged* aid to ventilation

Each Numa Dura-Tab provides:

theophylline	225 mg.
ephedrine HCl	50 mg.
butabarbital	25 mg.

(Warning: butabarbital may be habit-forming.)

Numa Dura-Tabs provide *prolonged* three-way action to ease breathing. Theophylline, a potent bronchodilator with minimal effect on the CNS, opens air passages and reduces bronchial spasm. Ephedrine HCl improves breathing capacity through its decongestant action. Butabarbital, a mild sedative, allays fear and apprehension.

Dosage: One Numa Dura-Tab every 8 to 12 hours helps keep the asthmatic patient symptom-free all day/all night.

Precautions: Use with caution in cardiovascular or hyperthyroid disease, severe hypertension, circulatory collapse, prostatic hypertrophy, or glaucoma.

WYNN Pharmaceuticals, Inc. Phila., Pa. 19132 • Manufacturers of QUINAGLUTE® DURA-TABS®
(QUINIDINE GLUCONATE 5 gr.)

Hundreds of Hotels Await AMA Convention in June

When Atlantic City made its debut in 1860 as a resort, there were five hotels, but when Michigan physicians and their wives go there June 18-22 for the AMA Convention there will be nearly 500 hotels, motels, and guest houses with a total of 30,000 rooms.

MSMS members will find many details about the medical programs in each issue of the AMA *News* and *JAMA*.

Prior to 1850, Atlantic City was a popular fishing village whose visitors arrived by a combination of horse and carriage and boat. The long journey was reduced in 1854 when the first train crossed the Delaware River. Now air travel is the transportation for most of those visiting the salt-water taffy town.

HEALTH FACILITIES PLANNING COUNCIL HAS NEW DIRECTOR

Edwin S. Marsh took office May 1 as director of the Michigan Health Facilities Planning Council, succeeding Harry J. Parke, now in California.

Before coming to Lansing to accept the position, Mr. Marsh was director of the hospital and related facilities planning unit of the United Community Services in Grand Rapids. Concurrent to his UCS work, he was secretary of the West Central Regional Planning Council.

MSMS is one of several organizations which finances and participates in the Council.

STUDY VOCATIONAL REHABILITATION

McClellan Conover, M.D., Flint, has been named to the 11-member Policy Board for Comprehensive Planning for Vocational Rehabilitation Services.

Established by the State Board of Education, the policy-making group will direct a state-wide study of vocational rehabilitation needs and services.

James Rae, Jr., M.D., Chairman of the Department of Physical Medicine and Rehabilitation at the University of Michigan, was named as a technical consultant to the Board.

removes the mental blur

that clouds vision

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Each tablet or capsule contains
PHENOBARBITAL .... 16 mg.
(Warning: may be habit forming)
BENSULFOID® (See P D R) ...... 65 mg.
Precaution: same as 16 mg. of phenobarbital

SUSTAINED SEDATION AROUND THE CLOCK

Constructive Therapy

A Solfoton tablet or capsule at 6 hour intervals maintains sedation at the threshold of calmness, sustaining a mental climate for purposeful living.

Literature and clinical samples sent upon request.

FEDERAL LAW PROHIBITS DISPENSING WITHOUT PRESCRIPTION

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Solfoton *(yellow, uncoated tablets "P")*
100s, 500s, 5000s
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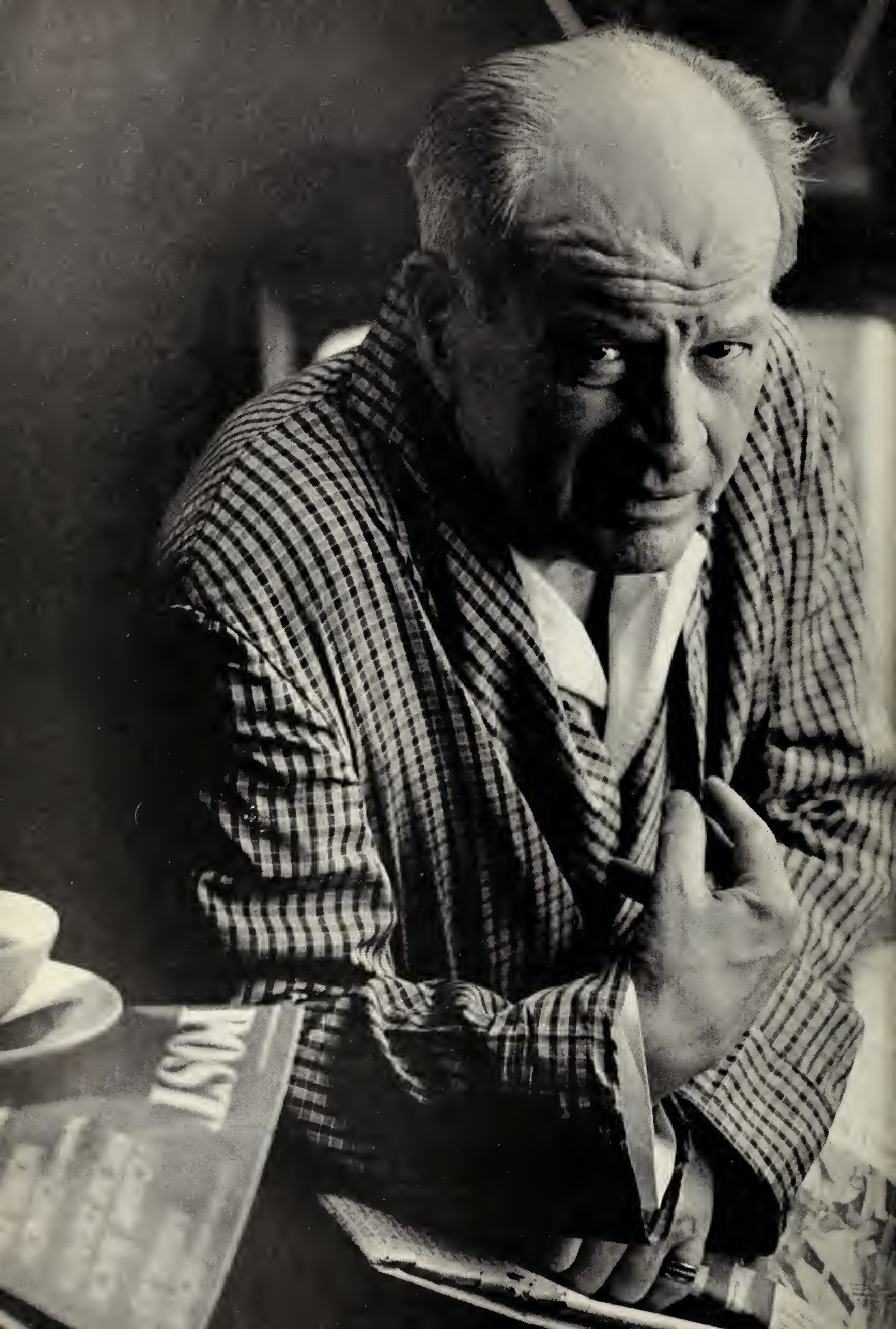
U-M MEDICAL GROUPS OFFERED NEW MOVIE

A 30-minute color movie, "Teaching, Research, and Service," depicting the educational life and statewide character of the University of Michigan Medical Center, is available for showing to alumni groups.

Persons interested in borrowing the film are requested to contact the Medical Center Alumni Society Office, M-7331 Medical Science Building, at the University.

The film reviews the history and current scope of the Medical Center. Produced by the U-M Television Center, it was commissioned by the Medical Center Alumni Society.



Posed by professional model

I'm supposed to get up and do things?

With my heart?

It's entirely natural—and may even be desirable—for the cardiovascular patient to be somewhat anxious about himself.

But when anxiety leads to unreasonable self-imposed limitations and restrictions . . . when it aggravates cardiovascular symptoms . . . when it interferes with restful sleep, measures to help alleviate the anxiety are probably in order.

One measure, of course, is reassurance. Another, adjunctive measure, is EQUANIL (meprobamate).

Over a decade of experience has shown that EQUANIL (meprobamate) is generally well tolerated as well as effective. Side effects are usually limited to transient drowsiness; serious, therapy-interrupting side effects are rare.

Cautions: Carefully supervise dose and amounts prescribed, especially for patients prone to overdose themselves. Excessive prolonged use may result in dependence or habituation in susceptible persons—as ex-addicts, alcoholics, severe psychoneurotics. After prolonged high dosage, drug should be withdrawn gradually to avoid possibly severe withdrawal reactions including epileptiform seizures. Side effects include drowsiness and, rarely, allergic or idiosyncratic reactions. These reactions, sometimes severe, can develop in patients receiving only 1 to 4 doses who have had no previous contact with meprobamate. Mild reactions are characterized by urticarial or erythematous maculopapular rash. Acute non-thrombocytopenic purpura with petechiae, ecchymoses, peripheral edema and fever have been reported. Meprobamate should be stopped and not reinstituted. Severe reactions, observed very rarely, include angioneurotic edema, bronchial spasms, fever, fainting spells, hypotensive crises (1 fatal case), anaphylaxis, stomatitis and proctitis (1 case) and hyperthermia. Warn patients of possible reduced alcohol tolerance. Should drowsiness, ataxia, or visual disturbances occur, dose should be reduced. If symptoms persist, patients should not operate vehicles or dangerous machinery. A few cases of leukopenia, usually transient, have been reported following prolonged dosage. Other blood dyscrasias—aplastic anemia (1 fatal case), thrombocytopenic purpura, agranulocytosis and hemolytic anemia—have occurred rarely, almost always in the presence of known toxic agents. One fatal case of bullous dermatitis following intermittent use of meprobamate with prednisolone has been reported. Prescribe very cautiously for patients with suicidal tendencies. Suicidal attempts should be treated with immediate gastric lavage and appropriate supportive therapy.

Contraindications: History of sensitivity to meprobamate.

Composition: Tablets, 200 mg. and 400 mg. meprobamate. Coated Tablets, WYSEALS® EQUANIL (meprobamate) 400 mg. Continuous-Release Capsules, EQUANIL L-A (meprobamate) 400 mg.

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to help relieve anxiety and tension occurring alone or secondary to organic disease

Equanil®
(meprobamate)

Wyeth®
SERVICE TO MEDICINE

CITES IMPORTANCE OF COMMUNITY INVOLVEMENT IN MENTAL TREATMENT

Over 170 persons responsible for mental health in Oakland county participated in a seminar May 3 which dealt with "Principles, Practices and Priorities of Community Mental Health."

"The decision and action on the part of the person being treated," according to Louis Miller, M.D., keynote speaker at the conference, "is one of the most important elements in a good community mental health program. The participation of the individaul in working out his own destiny is a key part of his treatment."

Doctor Miller, a native of South Africa who is currently visiting professor of community psychiatry at the Illinois Psychiatric Institute in Chicago, also stressed the importance of the involvement of the community in psychiatric care by stating that "Community participation should extend even to negotiation with the hospital staff about the type of case admitted to and discharged from the hospital."

According to Judy Rensberger, Mental Health Educator and Coordinator of the Conference, Doctor Miller's point about community involvement was one of the most significant observations because, "A lot of people talk about the community but don't really reach out to involve the community in the treatment of the individual."

VAN RIPER HONORED

At age 91 one of the state's oldest practicing physician and Michigan's Foremost Family Physician in 1957, Paul Van Riper, M.D., Champion, has received another honor. A state park which he originally began as a recreation area for the people of Marquette County, has been named, in his honor, the Van Riper Park.

ASKS VIEWS RE MD DRAFT

Members of the American Medical Association, medical societies and other professional organizations have been asked to send their constructive comments and suggestions concerning the operation of the doctor draft to the AMA Committee studying the conscription of physicians.

TOWSLEY NAMED HEAD OF U-M PG DEPARTMENT

Harry A. Towsley, M.D., Associate Director of the University of Michigan's statewide program in Postgraduate Medicine, is the new director, advanced recently by the U-M Board of Regents. Doctor Towsley, given a new rank of professor of graduate medicine and chairman of the department, has been associated with the University since 1934.

Doctor Towsley, who also serves as chairman of the MSMS Committee on Postgraduate Medicine and chairman of the Annual Session Program Committee, fills the vacancy created February 12 by the death of John M. Sheldon, M.D.

Delegates this Fall To Meet in GR Civic Auditorium

The 1967 MSMS House of Delegates will hold its September 24-26 session in the Black and Silver Room of the Grand Rapids Civic Auditorium, according to James J. Lightbody, M.D., Detroit, Speaker of the House of Delegates.

This change in location, from the Ballroom of the Pantlind Hotel, will provide much additional space for the seating of delegates and guests, Doctor Lightbody reported. Too, there will be sufficient facilities nearby for the stenographic room, the news room, and registration desks. The delegates, Doctor Lightbody stated, will find the new arrangement much more convenient.

SEEK INFO ABOUT BACKERS OF DETROIT MEDICAL COLLEGE

Descendants of the original subscribers to the old Detroit Medical College are being sought by the WSU Centennial Commission. Leads about families of the following persons (and businesses, who contributed some $30,000 to help meet the incorporation requirement, can be forwarded to Ronald Russell, TE 3-1400, Ext. 7348 at WSU.

The original subscribers were:

James F. Joy, Philo Parsons, Christian H. Buhl, A. C. McGraw, Merrill I. Mills, Allan Shelden, Henry P. Baldwin, Caleb Van Husan, George S. Frost, Hiram Walker, William A. Butler, John Owen, Buckminster Wight.

David Cooper, Frederick Stearns, Ira Davis, H. A. and S. G. Wight, M. S. Smith and Co., Holmes and Webster, William W. Wheaton, William Wright, William A. Moore, William Johnston, Witbeck and Chittenden, George C. Hand, Alexander Chapaton, A. G. Lindsay, J. H. Griffith, William B. Wesson, E. B. Smith and Co., Henry Weber, Simon Mandelbaum, and George M. Wheeler.

PRAISES DOCTORS AS MEASLES CASES DROP

The efforts of private medicine and public health have saved many children from measles and may have broken the epidemic cycle of the disease, according to John L. Isbister, M.D., Chief of the Bureau of Community Health, State Department of Public Health.

The measles record in Michigan for 1967 compares favorably with last year and is far below the 1963 epidemic year. While there were 27 fatalities in 1963 as a result of measles, the total dropped to six last year and hopefully will be lower this year.

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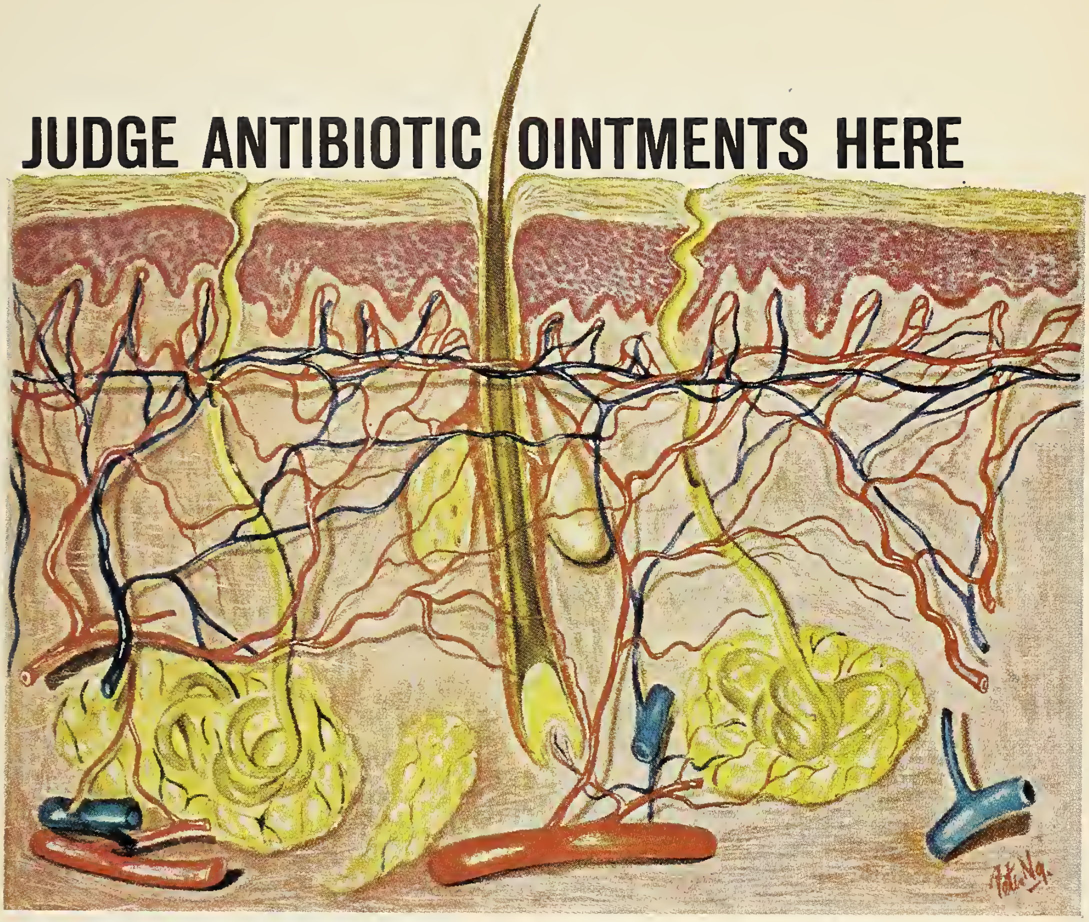

Results on skin are final proof of any topical antibiotic's effectiveness

No in vitro test can duplicate a clinical situation on living skin. 'Neosporin' (polymyxin B—bacitracin—neomycin) Ointment has consistently proven its effectiveness in thousands of cases of bacterial skin infection. The spectra of the three antibiotics overlap in such a way as to provide bactericidal action against most pathogenic bacteria likely to be found topically. Diffusion of the antibiotics from the special petrolatum base is rapid since they are insoluble in the petrolatum, but readily soluble in tissue fluids. The Ointment is bland and nonirritating.

Caution: As with other antibiotic preparations, prolonged use may result in overgrowth of nonsusceptible organisms and/or fungi. Appropriate measures should be taken if this occurs. Articles in the current medical literature indicate an increase in the prevalence of persons allergic to neomycin. The possibility of such a reaction should be borne in mind.

Contraindications: This product is contraindicated in those individuals who have shown hypersensitivity to any of its components.

Supplied: Tubes of 1 oz., ½ oz. with applicator tip, and ⅛ oz. with ophthalmic tip.

Complete literature available on request from Professional Services Dept. PML.

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POLYMYXIN B-BACITRACIN-NEOMYCIN
OINTMENT

BURROUGHS WELLCOME & CO. (U.S.A.) INC., Tuckahoe, N.Y.

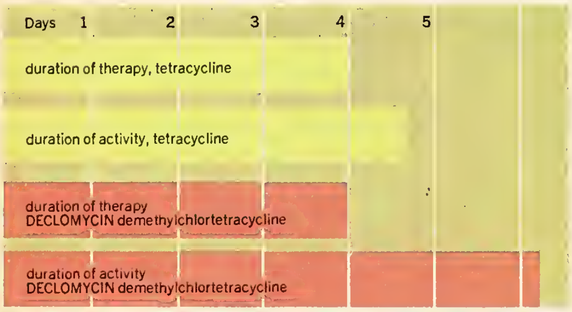
why wonder about a drug

when you know

DECLOMYCIN®

DEMETHYLCHLORTETRACYCLINE

produces 1-2 “extra” days’ activity



1-2 “extra” days’ activity
after the last dose to protect against relapse

one 300 mg tablet b.i.d.
or
one 150 mg capsule q.i.d.

Effective in a wide range of everyday infections—respiratory, urinary tract and others—in the young and aged—the acutely or chronically ill—when the offending organisms are tetracycline-sensitive.

Contraindication—History of hypersensitivity to demethylchlortetracycline.

Warning—In renal impairment, usual doses may lead to excessive systemic accumulation and liver toxicity. Under such conditions, lower than usual doses are indicated and, if therapy is prolonged, serum level determinations may be advisable. A photodynamic reaction to natural or artificial sunlight has been observed. Small amounts of drug and short exposure may produce an exaggerated sunburn reaction which may range from erythema to severe skin manifestations. In a smaller proportion, photoallergic reactions have been reported. Patients should avoid direct exposure to sunlight and discontinue drug at the first evidence of skin discomfort.

Precautions and Side Effects—Overgrowth of nonsusceptible organisms may occur. Constant observation is essential. If new infections appear, appropriate measures should be taken. Use of demethylchlortetracycline during tooth development (last trimester of pregnancy, neonatal period and early childhood) may cause discoloration of the teeth (yellow-grey-brownish). This effect occurs mostly during long-term use but has also been observed in short treatment courses. In infants, increased intracranial pressure with bulging fontanels has been observed. All signs and symptoms have disappeared rapidly upon cessation of treatment. Side reactions include glossitis, stomatitis, proctitis, nausea, diarrhea, vaginitis and dermatitis. If adverse reaction or idiosyncrasy occurs, discontinue medication and institute appropriate therapy. Anaphylactoid reactions have been reported.

Average Adult Daily Dosage: 150 mg q.i.d. or 300 mg b.i.d. Should be given 1 hour before or 2 hours after meals, since absorption is impaired by the concomitant administration of high calcium content drugs, foods and some dairy products.

Capsules: 150 mg; *Tablets:* film coated, 300 mg, 150 mg, and 75 mg of demethylchlortetracycline HCl.

LEDERLE LABORATORIES, A Division of American Cyanamid Company, Pearl River, New York
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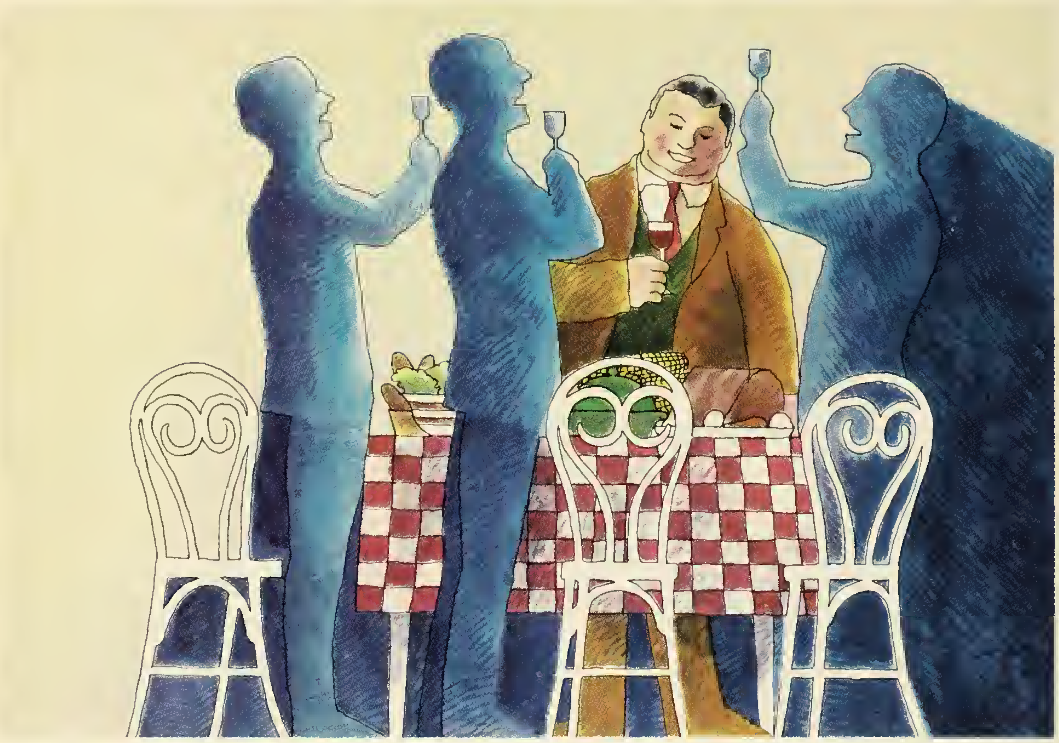
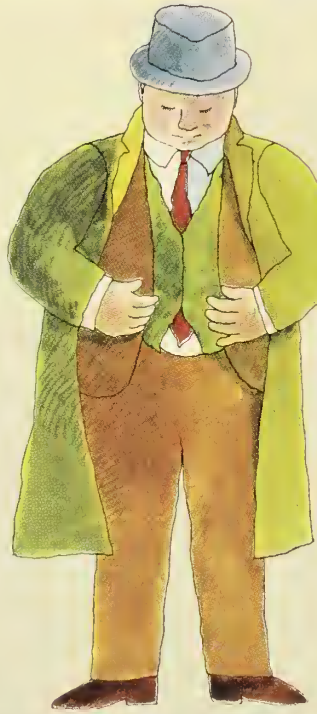
Lederle

For he's a jolly good fellow



But what does he think?



Many overweight patients can benefit from the appetite control provided by the sustained anorexigenic-tranquilizing action of BAMADEX SEQUELS: anorexigenic action of amphetamine; tranquilizing action of meprobamate; prolonged action through sustained release of active ingredients.

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DEXTRO-AMPHETAMINE SULFATE (15 mg.) WITH MEPROBAMATE (300 mg.) SUSTAINED RELEASE CAPSULES

to help establish a new dietary pattern

Contraindications: Dextro-amphetamine sulfate: in hyperexcitability and in agitated prepsychotic states. Previous allergic or idiosyncratic reactions to meprobamate.

Precautions: Use with caution in patients hypersensitive to sympathomimetic compounds, who have coronary or cardiovascular disease, or are severely hypertensive.

Dextro-amphetamine sulfate: Excessive use by unstable individuals may result in psychological dependence.

Meprobamate: Careful supervision of dose and amounts prescribed is advised, especially for patients with known propensity for taking excessive quantities of drugs. Excessive and prolonged use in susceptible persons, e.g. alcoholics, former addicts, and other severe psychoneurotics, has been reported to result in dependence on the drug. Where excessive dosage has continued for weeks or months, reduce dosage gradually. Sudden withdrawal may precipitate recurrence of preexisting symptoms such as anxiety, anorexia, or insomnia; or withdrawal reactions such as vomiting, ataxia, tremors, muscle twitching and, rarely, epileptiform seizures. Should meprobamate cause drowsiness or visual disturbances, reduce dosage and avoid operation of motor vehicles, machinery or other activity requiring alertness. Effects of excessive alcohol consumption may be increased by meprobamate. Appropriate caution is recommended with patients prone to excessive drinking. In patients prone to both petit and grand mal epilepsy meprobamate may precipitate grand mal attacks. Prescribe cautiously and in small quantities to patients with suicidal tendencies.

Side Effects: Overstimulation of the central nervous system, jitteriness and insomnia or drowsiness.

Dextro-amphetamine sulfate: Insomnia, excitability, and increased motor activity are common and ordinarily mild side effects. Confusion, anxiety, aggressiveness, increased libido, and hallucinations have also been observed, especially in mentally ill patients. Rebound fatigue and depression may follow central stimulation. Other effects may include dry mouth, anorexia, nausea, vomiting, diarrhea, and increased cardiovascular reactivity.

Meprobamate: Drowsiness may occur and can be associated with ataxia; the symptom can usually be controlled by decreasing the dose, or by concomitant administration of central stimulants. Allergic or idiosyncratic reactions: maculapapular rash, acute nonthrombocytopenic purpura with petechiae, ecchymoses, peripheral edema and fever, transient leukopenia. A case of fatal bullous dermatitis, following administration of meprobamate and prednisolone, has been reported. Hypersensitivity has produced fever, fainting spells, angioneurotic edema, bronchial spasms, hypotensive crises (1 fatal case), anuria, stomatitis, proctitis (1 case), anaphylaxis, agranulocytosis and thrombacytopenic purpura, and a fatal instance of aplastic anemia, but only when other drugs known to elicit these conditions were given concomitantly. Fast EEG activity, usually after excessive dosage. Impairment of visual accommodation. Massive overdosage may produce drowsiness lethargy, stupor, ataxia, coma, shock, vasomotor and respiratory collapse.

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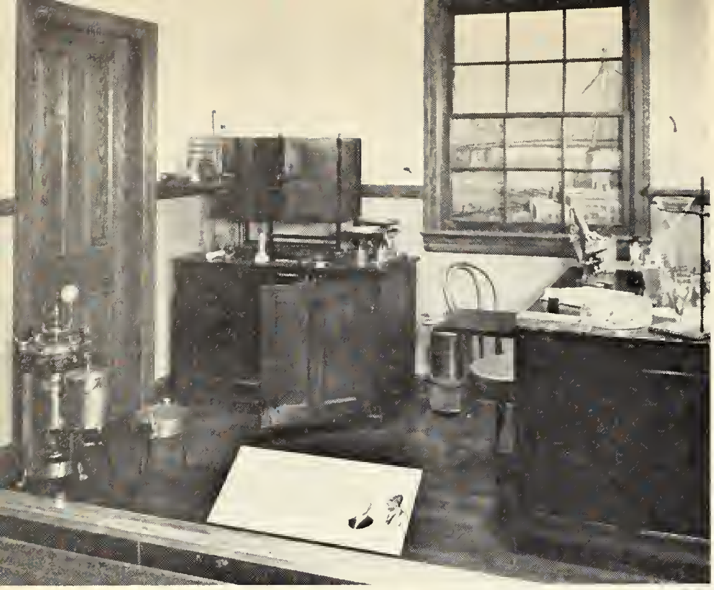

The equipment used by pioneer American microbiologist, Frederick G. Novy, M.D., at the University of Michigan forms part of a display at the Smithsonian Institute in Washington, D.C., intended to illustrate what a typical late 19th and early 20th-century bacteriological research laboratory looked like. Doctor Novy, who studied with Koch and Pasteur, was Professor of Bacteriology and briefly Acting Dean of the University of Michigan Medical School.

NOTED AND QUOTED

Congressman James Harvey: "Major discussion and consideration will again center on our nation's commitment to Vietnam and the economy. A record, back-breaking administrative budget for fiscal year 1968 — $172.4 billion — calling for an estimated deficit of $11.5 billion, is certain to be scrutinized carefully. Other major legislative proposals to be considered will be crime; social secuity; taxes; election reform; air and water pollution; trade relations with communist countries; Code of Ethics for Members of Congress; and others."

THE BIG LOOK

REPRINTED FROM GRANDVILLE STAR

"Each year the Council on Medical Education of the American Medical Association issues a report on medical education in the United States. Much of this report is devoted to facts and figures concerning numbers of students and faculty. However, as might be expected, the current report reflects what has been called, 'The Year of the Big Look at Medicine.' Included are brief summaries of various studies having to do with '. . . ideas and mechanisms with the potential for further progress in medical education and medical care.'

"The most striking aspect of this year's report, as far as the layman is concerned, is the clear evidence it contains of the medical profession's determination to respond constructively to the formidable and economic problems imposed by such things as inflation, Medicare and other governmental, as well as private, programs that are vastly increasing demands on all available medical facilities and personnel. It is equally evident from the report that the profession does not intend to compromise the standards of excellence that have marked the development of the American medical system. The goal is '. . . to provide society with medical services of a quality limited only to available knowledge.'

"The foregoing indicates the trend of medical education. As time goes on, the great issue posed by the growing intervention of government in medicine will be debated all across the land. The doctors will and should continue to oppose measures which they feel are in conflict with the cause of good medicine."

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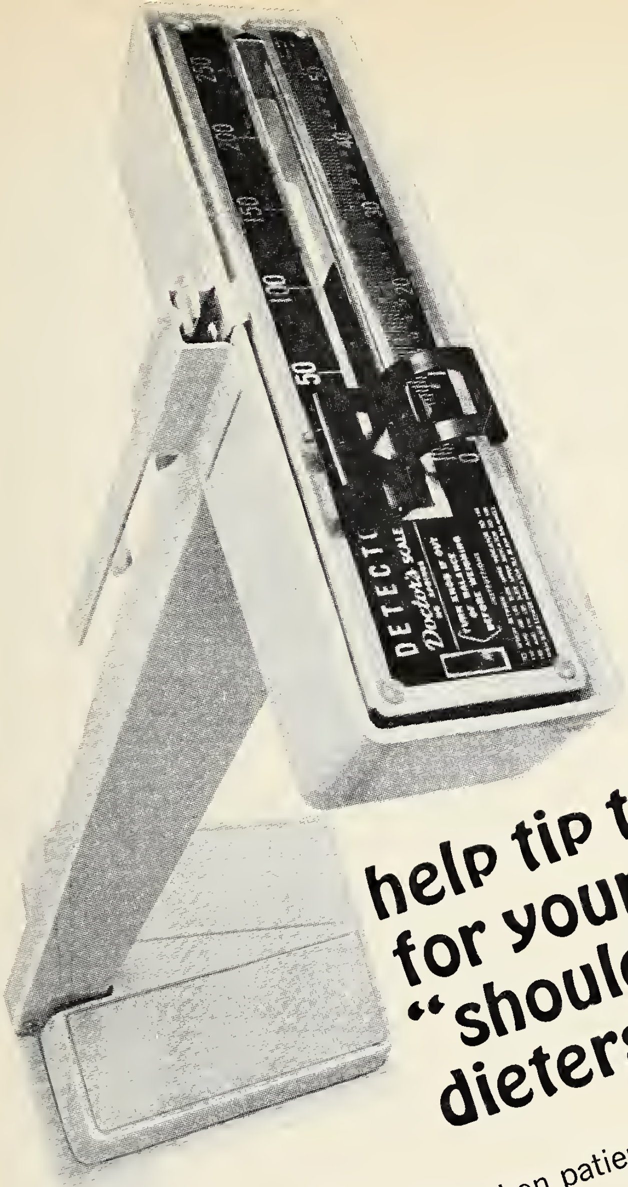
- Rehabilitative services for geriatric and convalescent patients.
- Medico-Legal counsel.
- Diagnostic and psychological evaluation and hospitalization, if indicated, of juveniles for Probate and Juvenile Courts.



help tip the scales for your "should-but-can't" dieters...

- ☐ controls the appetite
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dextro-amphetamine HC1	15 mg.
amobarbital (barbituric acid derivative)	60 mg.

WARNING: may be habit forming

)OSAGE: One capsule on arising or at breakfast. Drugs are released :radually over 6 to 8 hours, providing therapeutic effect for 10 to 12 ours.

NDICATIONS: AMODEX Timed Capsules elevate the mood, relieve ner- ous tension, restore emotional stability and emotional capacity for hysical and mental effort. AMODEX Timed Capsules are extremely use- ul in the treatment of anxiety states and may be used to control ppetite in the management of the obese patient — without nervous xcitation.

SIDE EFFECTS AND PRECAUTIONS: Frequent or continued use may cause nervousness, sleeplessness, or restlessness. Individuals suffering from high blood pressure, heart disease, diabetes, thyroid disease, lung ailments, or kidney disorders should not take this product. It should not be taken over a long period of time.

CONTRAINDICATIONS: Hyperexcitability, agitated pre-psychotic states. Sensitivity to Amphetamines or Barbiturates.

CAUTION: Federal Law prohibits dispensing without prescription.

SUPPLIED: In bottles of 30, 100, and 1000 capsules.

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Five National Reports Under Study; All Deal with Medical Education

All physicians are interested in the findings and recommendations of five national studies dealing with various aspects of medical education. All are interrelated to some degree. Physicians interested in specific recommendations of these reports, are invited to write to the MSMS Education Liaison Committee, 120 West Saginaw, East Lansing 48823. County medical societies have been invited by the AMA to react to the recommendations of the "Millis Report."

CITIZENS COMMISSION ON GRADUATE MEDICAL EDUCATION (MILLIS REPORT)

—Appointed by AMA Board of Trustees in 1963. John S. Millis, M.D., was chairman.

—*Report presented August 1, 1966, through AMA Board of Trustees to the public. The AMA printed the Report in pocket-book format.

—A three-hour hearing on the Report was conducted November 29, 1966, at the AMA Clinical Convention in Las Vegas, Nevada. No action was taken by the AMA House of Delegates at that time.

—State and county medical societies have been urged to study the Report.

—The AMA House of Delegates is scheduled to consider the Report at its June 1967 meeting in Atlantic City.

—The American Academy of General Practice Board of Directors on November 26, 1966, issued a statement on the Report.

—The American College of Physicians Committee on Medical Services Re Family Practice presented a report to the ACP Board of Regents, November 12, 1966.

AMA AD HOC COMMITTEE ON EDUCATION FOR FAMILY PRACTICE

—This Ad Hoc Committee was appointed in 1964. It included representatives of the American Medical Association Council on Medical Education, American Academy of General Practice, and the Association of American Medical Colleges. W. R. Willard, M.D., was chairman.

—The Committee report was made September 1966 to the three groups. The AMA published the 58-page booklet, entitled "Meeting the Challenge of Family Practice."

—The report made 6 major recommendations. An article about the Report and the 6 recommendations appears on page 201 of *Michigan Medicine,* February 1967.

—AMA House of Delegates in Las Vegas, Nevada, November 29, 1966, authorized the AMA Council on Medical Education "to develop and initiate plans for implementation of the recommendations." The Committee report calls for "major efforts to encourage new programs for the education of large numbers of family physicians for the future," development of "models of family practice" by medical schools and teaching hospitals, "recognition and status equivalent to other

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*Chapter 5 of the Millis Report about comprehensive health care in many ways deals with the "same" concerns as those in the Report of the AMA Ad Hoc Committee on Education for Family Practice.

medical specialties" and "an appropriate system of specialty certification" for family practice.

—The American Academy of General Practice *Bulletin,* Nov. 1966, carried an article re the AMA House Action.

REPORT OF THE COMMITTEE OF THE ASSOCIATION OF AMERICAN MEDICAL COLLEGES (COGGESHALL REPORT)

—This Committee was appointed by AAMC in 1964.

—The Committee reported on April 19, 1965, to its executive committee. The Committee identified 12 trends as being significant in medicine today. The MSMS Library has a copy of the full Report. Doctor Coggeshall used the Report as the basis for an address on May 12, 1966, at Billings Hospital, Chicago.

—The AAMC, it is reported, acted at its corporate membership meetings in 1965 and 1966 to concur in general with the recommendations after some changes.

—The AMA House of Delegates in November 1965 at Philadelphia received from the AMA Council on Medical Education a "Critique of the Coggeshall Report." The House took action to disagree with the basic philosophy of the Coggeshall Report and indicated that "largely because of the interest and participation of the medical profession and its Association, medical education occupies the highest position in professional education in this country today. This responsibility cannot be delegated to nor assumed wholly by any other group."

REPORT OF THE NATIONAL COMMISSION ON COMMUNITY HEALTH (FOLSOM REPORT)

—The Commission was organized in 1962.

—The Commission was sponsored by the American Public Health Association and the National Health Council.

—The Commission, a private, non-profit study group, had 32 members from medicine, business, labor and other fields.

—Marion B. Folsom, former Secretary of Health, Education and Labor, was the chairman.

—The Commission presented its report to President Johnson on April 20, 1966.

—The Commission took 14 positions in its report with 98 minor recommendations. President Johnson endorsed the recommendations.

—The AMA asked its Division on Socio-Economic Affairs to review the recommendations.

—One of the 14 Commission positions dealt with "The Personal Physician."

—The *AMA News,* May 2, 1966, carried an item about the NCCHS report.

NATIONAL ADVISORY COMMISSION ON HEALTH MANPOWER

—Established by President Johnson, May 1966; Peter S. Bing, M.D., Executive Director.

—The Commission is studying many aspects of health manpower, demands for health care, etc.

More about doctors

S. J. Behrman, M.D., Professor of Obstetrics and Gynecology and Director of the Center for Research in Reproductive Biology at the University of Michigan Medical School, is the recent winner of the 1967 American Fertility Society Ortho Medal and an award of $1,000. Dr. Behrman has received acclaim for research on various aspects of human reproduction, particularly his studies during the past three years with frozen sperm.

* * *

A midwest conference of the American Association of Medical Society Executives at Columbus recently featured Hugh W. Brenneman, MSMS Executive Director, on the first panel about "Implementing Action Programs between County, State and the AMA."

* * *

Harvey V. Sparks, M.D., Physiology Instructor at the University of Michigan Medical School, has been appointed a Markle Scholar in Academic Medicine. Doctor Sparks, whose father is an internist in Flint, is one of 25 young medical scientists selected for the $30,000 award of the John and Mark R. Markle Foundation of New York. The U-M doctor is currently doing research on coronary atherosclerosis.

* * *

Robert E. Rice, M.D., Greenville, Chairman of the MSMS Committee on Rural Medical Service, participated recently in Charlotte, North Carolina, at the AMA Council on Rural Health and the State Medical Association's Rural Health Committee Chairmen.

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Baby has a thing or two to say about a hypo-allergenic, milk-free diet!

Soyalac is the good-tasting, fibre-free formula that infants readily accept. The exclusive Soyalac process results in a consistency much like milk, with a light, creamy color—and nut-like flavor but without a trace of sediment.

Soyalac satisfies the infant. Strikingly similar to mother's milk, it provides protein of high biologic value and balanced nutrients. Clinical data furnish evidence of Soyalac's excellence in promoting normal growth and development.

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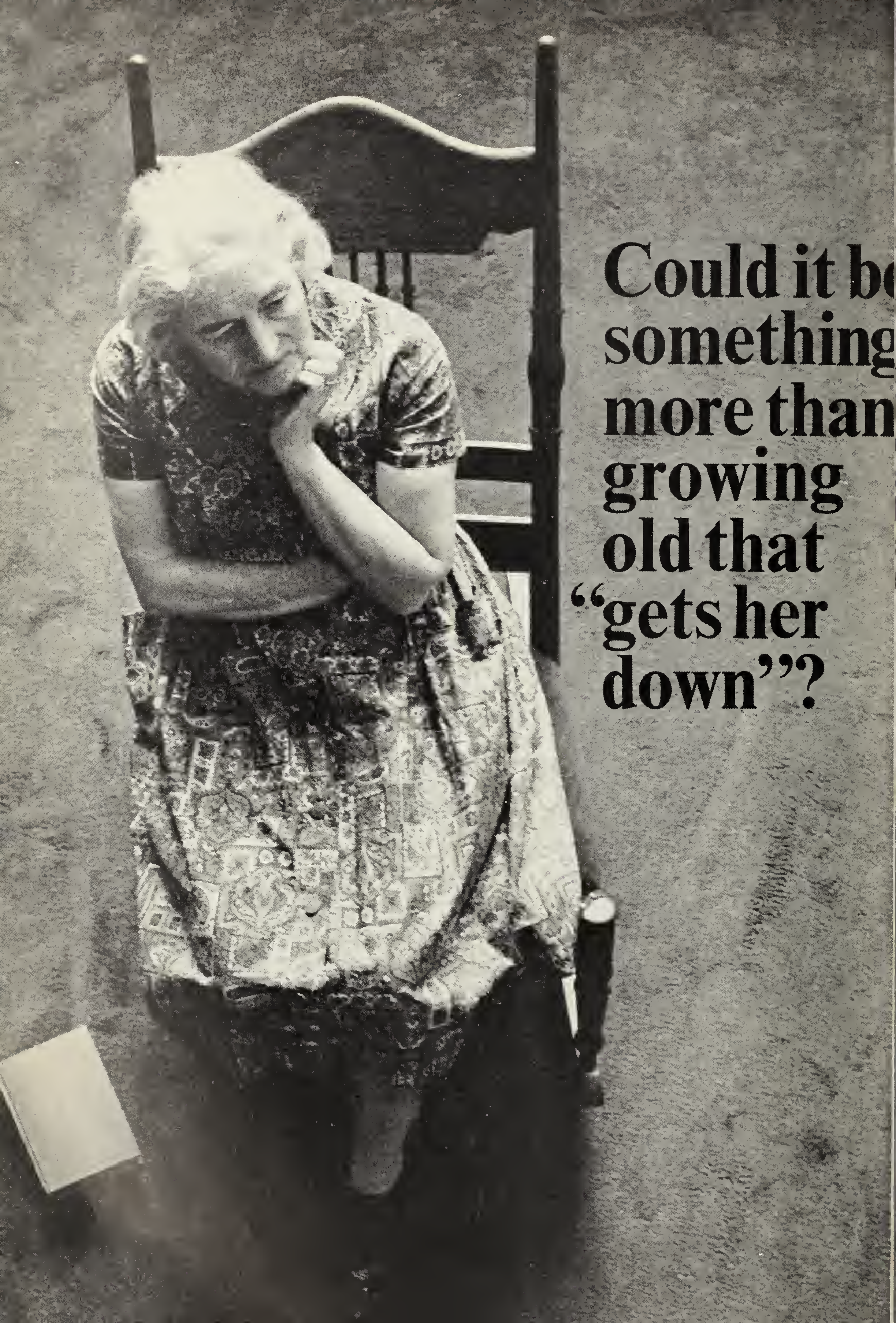
This is an electric heat panel.
Sitting here, wearing just a gown, it feels like the sun.

The temperature that's right for you and your nurse can really put a chill on a thinly clad patient. Here's how all can be comfortable:
Install an infrared radiant electric heat panel over the examining table. It will warm the patient without appreciably raising the temperature of the room.
We've run some test applications. Doctors and patients alike were pleased.
If you've a "spot-warming" problem in examining rooms, or in any other area, ask your nurse or secretary to contact the local Edison office. We'll send a representative at your convenience. He'll have complete information about the variety of radiant panels available. No obligation, of course. **EDISON**


Could it b
something
more than
growing
old that
"gets her
down"?

Mild mood depression, poor appetite, little interest in the present or future. Does this picture mean that she's giving in to functional fatigue?

When functional fatigue is part of her problem, Alertonic can help counteract accompanying apathy and inertia. It helps lift mood, stimulate appetite, and establish new interest in daily life.

Pleasant-tasting Alertonic combines pipradrol hydrochloride—a gentle cerebral stimulant—with an excellent vitamin and mineral formula, in a satisfying 15% alcohol vehicle.

Especially in the aging patient, nothing fosters confidence and a sense of well-being better than your own personal warmth, understanding, and encouragement. Between visits, however, your prescription for Alertonic can help keep your patient from giving in to functional fatigue.

Adequate dosage is important: Prescribe Alertonic—one tablespoonful t.i.d., 30 minutes before meals ...tastes best chilled.

And for your patient's sake, prescribe Alertonic in the convenient, economical one-pint bottle.

Available only on prescription

Alertonic®

Each 45 cc. (3 tablespoonfuls) contains: alcohol, 15%, pipradrol hydrochloride, 2 mg.; thiamine hydrochloride (vitamin B_1) (10 MDR*), 10 mg.; riboflavin (vitamin B_2) (4 MDR), 5 mg.; pyridoxine hydrochloride (vitamin B_6), 1 mg.; niacinamide (5 MDR), 50 mg.; choline,† 100 mg.; inositol,† 100 mg.; calcium glycerophosphate, 100 mg. (supplies 2% MDR for calcium and for phosphorus) and 1 mg. each of the following: cobalt (as chloride), manganese (as sulfate), magnesium (as acetate), zinc (as acetate), and molybdenum (as ammonium molybdate).

*Multiple of adult Minimum Daily Requirement supplied.
†The need for these substances in human nutrition has not been established.

Indications: 1. Functional fatigue such as that often associated with: a depressing experience or stressful time of life; advancing years; convalescence; limited activity or confinement. 2. Poor appetite and vitamin-mineral deficiency as they occur in: patients having faulty eating habits; geriatric patients who are losing interest in food; patients convalescing from debilitating illness or surgery.

Contraindications: As with other drugs with CNS stimulating action, Alertonic is contraindicated in hyperactive, agitated or severely anxious patients and in chorea or obsessive compulsive states.

Side effects: Reports of overstimulation have been rare. Patients who are known to be unduly sensitive to the effects of stimulant drugs should be observed carefully in the initial stages of treatment.

Dosage: Adults, 1 tablespoonful; children (over 15 years old), 1 to 2 teaspoonfuls; children (4 to 15 years old), 1 teaspoonful. To be taken three times daily 30 minutes before meals.

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MSMS, OCMS Give Citations To Beloved Clifford T. Ekelund, M.D.

"Our town honored its doctor last night" reported a newspaper after 500 patients, physicians and friends gathered for a dinner at Pontiac to honor Clifford Ekelund, M.D., former MSMS secretary.

Now 73 years young, Doctor Ekelund was lauded by patients and saluted by citations from MSMS and Oakland County Medical Society.

"He is my parent's doctor, my own, and the doctor of my kids. He delivered all my children."

"He operated on me 14 times, on my mother 8 times."

These were some of the comments people made who were attending the dinner.

What is the quality which best personifies Dr. Ekelund as a physician? One of his life-long patients put it this way: "No matter how many people were in the office, he always treated you like an individual. The only time he got impatient is if you didn't really need him. Because of his concern for you, Doctor Ekelund wasn't above sending you to someone else if it was something he couldn't do."

When Everette Gustafson, M.D., of Pontiac, began to plan the surprise dinner in honor of Doctor Ekelund, he did not know how the turnout would be. Nor did he know how Doctor Ekelund would feel, because he has recently been suffering from serious illness at the age of seventy-three.

"What we were trying to do," explains Doctor Gustafson, "was to have a dignified celebration for one of our elder statesmen — a celebration which would show how grateful we are to him and how much we appreciate him. From the reports I have received, we were successful." The dinner in Pontiac was the occasion for people to give public expression of their gratitude to a man who has served them for over forty years. What it meant to Dr. Ekelund himself is best summed up in his own words: "If anyone wanted to know if a lifetime of activity such as mine is worthwhile, I would just point to the people who are here tonight."

His leadership to medical organizations included service as MSMS secretary and Oakland County president. In making the MSMS presentation, MSMS Council Chairman Robert J. Mason, M.D., cited Doctor Ekelund as one of the moving forces to start the Michigan Medical Service.

Commenting on the dinner, Doctor Mason said,

Clifford Ekelund, M.D., left, Pontiac, receives a handsome citation from Robert J. Mason, M.D., Chairman, MSMS Council, in appreciation of the service given by Doctor Ekelund to his county medical society, to MSMS as its one-time secretary, and in his efforts to help organize Michigan Medical Service.

"The Pontiac newspaper headline summed up the spirit of the dinner: 'Our town honored its doctor last night.'

"This is not a title created by a public relations firm or a Madison Avenue advertisement, but simple words which express the feelings of an entire town about one of its doctors," he said.

"In the course of the dinner," Dr. Mason continued, "it became clear to me that the image of the medical profession is not going to be improved by any massive public relations campaign. The image of the medical profession is made in hospitals, waiting rooms, homes and on the telephone. Ultimately, it is based in the humanity and kindness of the men who practice medicine."

in memoriam

Harold E. Clark, M.D.

Harold E. Clark, M.D., Detroit pediatrician for more than 50 years, died April 5 at the age of 77.

A native of Detroit, Doctor Clark had lived here and in Birmingham until his retirement two ears ago when he moved to Port Franks, Ontario.

He was a graduate of the University of Michigan Medical School, and during World War I he erved overseas with the Harper Hospital staff medcal unit. Doctor Clark was also affiliated with Providence Hospital, serving on the emeritus staff.

A member of the Sons of the American Revolution and Phi Rho Sigma medical fraternity, Doctor Clark was a past president of the Detroit Pediatrics Society.

Doctor Clark was a Life Member of the Michigan State Medical Society which in 1964 awarded him a 50-Year Pin.

Herbert E. Fogt, M.D.

Herbert E. Fogt, M.D., Detroit general practitioner for more than 50 years, died April 14. He was 78.

A graduate of Wayne State University Medical School, Doctor Fogt was affiliated with East Side General Hospital.

He was a Life Member of the Michigan State Medical Society, and in 1914 he was awarded a 50-Year Pin.

F. S. Hosking, M.D.

Frederick S. Hosking, M.D., Lake Linden general practitioner, died March 26 at the age of 65.

Doctor Hosking attended the University of Michigan and was graduated from McGill University in 1930.

A senior flight surgeon in the Naval Reserve, Doctor Hosking held the rank of captain. During World War II he served in the Pacific Theatre.

Doctor Hosking held memberships in the Lions Club, the Calumet Lodge, and the Calumet-Laurium VFW Post. He was a fellow of the American Academy of General Practitioners and had served on the Ethics Committee of the Houghton-Baraga-Keweenaw Medical Society.

M. J. Spector, M.D.

Maurice J. Spector, M.D., Detroit general practitioner, died March 29. He was 56.

A graduate of Wayne State University Medical School, Doctor Spector was affiliated with Deaconess Hospital.

During World War I Doctor Spector served in the armed forces. He was a member of Phi Lambda Kappa medical fraternity.

Chester Van Appledorn, M.D.

Chester Van Appledorn, M.D., Holland physician and an authority on the American Indian and Michigan wildflowers, died April 9. He was 56.

A graduate of Wayne State University Medical School, Doctor Van Appledorn was affiliated with Holland City Hospital. He was a medical examiner for the Federal Aviation Agency and a former member of the Holland Traffic and Safety Committee, and he once served as city health officer.

Doctor Van Appledorn, was a member of Phi Alpha Kappa medical fraternity, the Michigan and National Audubon Societies, and the Michigan Historical Society.

J. Payne Butler, M.D.

J. Payne Butler, M.D., Detroit physician for more than twenty years, died May 6 at the age of 70.

A native of Sedalia, Missouri, Doctor Butler received his medical degree from Meharry Medical College in 1923 and served his internship and residency at Kansas City (Missouri) General Hospital.

Doctor Butler came to Detroit in 1946. Prior to that time he practiced in Iola and Coffeyville, Kansas.

A member of the Detroit Medical Society, Doctor Butler was also a member of Kappa Alpha Psi medical fraternity.

He was a Life Member of the Michigan State Medical Society.

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FOR RENT: New eight room brick office equipped and furnished. Established physician died. Ground floor, central air conditioning, private paved parking on main street across from Community Hospital. In southwestern Michigan fruit belt area near city of 30,000 with industry. Mrs. J. F. Reed, Watervliet, Mich. 49098. Phone 616-463-5540.

GENERAL PRACTICE OPPORTUNITY: in association with three established General Practitioners in a suburban city near Detroit. Hospital privileges available at three hospitals. Salary and percentage leading to partnership after one year. Contact: Thomas Ganos, M.D., 6742 Park Ave., Allen Park, Mich. 48101. Phone DUnkirk 1-5675.

Calumet Public Hospital is in need of two General Practitioners and Surgeons. Recently remodeled with complete, up-to-date Lab, Pathology and X-Ray and Surgery departments. Population including surrounding area about 13,000. Excellent schools, churches of all denominations. Situated in the Copper Country of Michigan, a haven for outdoor sportsmen. Contact — Administrator, Calumet Public Hospital, Laurium, Michigan.

FOR LEASE: Suite available in June 1967 in Dearborn Professional Building, Military at Monroe, Dearborn, Michigan. Perfect set-up for eye specialist and/or ear, nose & throat specialist. Other specialties in building. Write or Call LO 1-7919 for appointment. Joseph M. Caputo, M.D., 205 Dearborn Professional Bldg., Dearborn, Michigan

OPEN IMMEDIATELY: Wonderful opportunity for General Practitioner. Doctor leaving large county circle, well-established practice in four season resort community. New Hospital being built. Very low overhead. With or without equipment. Office located in same building as drug store. Contact: Dudley Ensign, R.Ph., Onekama Drug Store, Onekama, Michigan 49675.

DIRECTOR OF MEDICAL EDUCATION: Full time. Consulting privileges. Adequate salary and fringe benefits. Approved teaching programs. Contact: Sister M. Rosalind, Administrator, Borgess Hospital, Kalamazoo, Michigan 49001.

DUCK HUNTERS ATTENTION: I am a registered duck guide and am now offering guide service on Northwest Saginaw Bay where there is lower hunting pressure, more ducks, better shooting. Decoys, boats and blinds provided. Write for free pictured brochure and newsletter. John Pestrue, Standish, Michigan.

FOR LEASE: 1100 square feet, air-conditioned, ample parking. Has been physicians office for 15 years. One of the busiest corners in Flint. Call 313-743-1510 or write: E. H. Sharon, D.D.S. G-3530 South Saginaw, Flint, Michigan 48507.

WANTED: A locum Tenens for the months of July and August in a GP office doing OB and surgery. Office is in hospital, located in southern Michigan. Due to expanding of hospital, need a partner capable of handling this type of practice. Will consider a trial offer. Excellent opportunity for the right man. Contact: Bowers H. Growt, M.D., Addison, Michigan.

BOYNE CITY: General Practitioner urgently needed to serve this growing community located in the heart of Northern Lower Michigan. Excellent opportunity. Three Hospitals within close radius. For further information please contact: Dr. Richard L. Fish, Boyne City Chamber of Commerce.

INTERNIST: Age 31, Board eligible, trained at Henry Ford Hospital. Recently completed N.I.H. Fellowship in respiratory diseases; experienced in pulmonary function studies. Desires association with Board certified internist (s) or affiliation with small group. Southern Michigan preferred. Reply: Box 3321, 10734 White Oak Ave., Granada Hills, California 91344.

X-RAY EQUIPMENT FOR SALE — 300 MA unit with ceiling mounted tube stand. Motor drive radiographic and fluoroscopic table with spot device plus complete dark room equipment. James D. Fryfogle, M.D., Medical Concourse, Northland Center, Southfield, Michigan 48075. Telephone EL 6-4546.

WANTED: INTERNIST AND GENERAL SURGEON, Hart, Modern Hospital; area population 16,000 winter, 25,000 summer. Six miles from Lake Michigan. Hunting, fishing, skiing within minutes. Good school system. No specialists in this area at present. Contact Robert Trautman, Oceana Hospital, Hart, Michigan 873-2131.

PHYSICIAN BADLY NEEDED — immediate practice opening created by unexpected death of active GP, whose office and equipment are available. 105 bed modern hospital, open staff. Serving population over 12,000, nine GP's, one internist, one surgeon presently desire more help. Excellent school and community facilities; just 35 miles south Ann Arbor; less than hour from Detroit, Toledo, in Irish-Hills area southeastern Michigan. R. D. Coak, M.D., 602 E. Pottawatamie, Tecumseh, Michigan 49286. Phone: (313) 423-2594.

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MICHIGAN MEDICINE
VOLUME 66, JUNE 1967, NUMBER ~~10~~ 12 — NEWS EXTRA — DEADLINE JUNE 13

Michigan Begins Heart, Cancer, Stroke Planning; Grant Received

(Editor's Note: A comprehensive article about MARMP appeared on Pages 717-722 by Neal A. Vanselow, M.D., Ann Arbor, in the June issue of Michigan Medicine.)

With tentative plans ready to go, the three medical schools and the state department of public health are moving ahead now to coordinate a Michigan assault on heart disease, cancer and stroke, following a federal grant of $1,285,155.

The U.S. Public Health Service's National Institutes of Health made the grant to the recently-formed Michigan Association for Regional Medical Programs.

MARMP IS A SPECIAL nonprofit corporation that includes the Michigan State Medical Society, University of Michigan, Wayne State University, Michigan State University, the Michigan Department of Public Health, the state's six health planning districts, other health organizations and public-at-large members. Eight of the twenty-one members of the MARMP advisory committee are doctors of medicine.

Robert Q. Marston, M.D., director of the Division of Regional Medical Programs of NIH, said, "We are delighted to acknowledge the award to this fine Michigan group. What is particularly gratifying is that plans for the Michigan program have been generated at the local level."

University of Michigan Dean William N. Hubbard, Jr., M.D., is president of MARMP, and Don Marshall, M.D., MSMS Councilor from Kalamazoo and the MSMS representative to MARMP, is vice-president.

OF THE GRANT, $161,781 is for a central MARMP staff to coordinate the program. Personnel is being recruited now.

The larger portion, $1,123,374, will support plans to develop the means to exchange the latest knowledge on the prevention, early detection, definitive diagnosis, treatment and after care of the three deadly diseases. The financing of patient care is not part of this federal law.

Slagle Nominated For Re-Election To AMA Council

George W. Slagle, M.D., MSMS Past President, Battle Creek, has been nominated for another five-year term on the AMA Council on Medical Education.

Delegates at the AMA convention in Atlantic City will elect one man to The Council. Doctor Slagle currently is Chairman of The Council on Medical Education. The Council recently voted to nominate Doctor Slagle for another term. The AMA Board of Trustees sent the nomination to the convention; and as is customary, the Board nominated a second candidate, Richard E. Palmer, M.D., of Alexandria, Va.

The MSMS delegation to the AMA will be lead by Luther R. Leader, M.D., MSMS Past President, who was selected as chairman by the delegation.

Watch for July Issue!

The excellent scientific program for the 1967 MSMS Annual Session, in Grand Rapids, September 27-28-29 will be printed in the July issue of MICHIGAN MEDICINE.

And there will be special stories and photographs about the headline speakers, special events, etc.

Watch for it. Make your plans today to participate.

The August issue will focus on the MSMS House of Delegates, in session September 24-25-26.

Outgoing Wayne State University Medical Alumni Association President John M. Pendy, M.D., left, presents gavel to 1967-68 president, Mario H. Petrini, M.D., also of Detroit, at the 1967 Medical School Alumni Clinic Day.

Five MDPAC Leaders Attend Big Workshop

Five Michigan physicians attended the American Medical Political Action Committee National Workshop held in Washington, D. C., June 3-4. Travelling to the capital were Vernon V. Bass, M.D., Saginaw, State MDPAC Chairman; Thomas Berglund, M.D., Kalamazoo; Robert J. Fisher, M.D., Pontiac; Donato Sarapo, M.D., Adrian; and Everette Gustafson, M.D., Pontiac, all MDPAC Board members. Ralph T. Wills, MSMS Staff Assistant to MDPAC, accompanied them.

The workshop featured outstanding AMPAC officers, government officials, political researchers, and representatives of state medical political action committees.

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26 Oakland Doctors Fly to Capitol

Oakland County physicians are moving to establish rapport with both state and federal legislators, reports Edgar J. Geist, Jr., M.D., of Rochester.

On June 7, 26 Oakland County physicians flew to Washington for a one-day meeting with Senators and Representatives. "We didn't go there with any pitch or representing any organization," said Doctor Geist, "but to show that we are interested enough to fly in as a group and just talk with them."

"Actually we see this as a long-range effort to establish good relationships," Doctor Geist explained. "We had no immediate objective in mind other than that we were a group of doctors who work with patients; we gave our legislators some idea of how we react and how our patients react to federal legislation."

"I have the feeling that sometimes legislators are wary of the formal lobby groups," Doctor Geist continued.

To continue their work on the national level, the physicians plan a return trip to Washington in six months.

To meet with the state legislators, the Oakland County physicians meet at Kingsley Inn the second Tuesday of each month for informal discussions.

New Mental Health Director Coming

On July 1, Wm. H. Anderson, M.D., a native of Ewen and a graduate of Albion and the U-M Medical School, will begin his duties as the new director of the State Mental Health Department.

Doctor Anderson will fill the vacancy created last November when Robert A. Kimmich, M.D., resigned. Dr. Kimmich went to California to enter private practice.

Doctor Anderson has been superintendent of the Mid-Missouri Mental Health Center at Columbia and associate professor of psychiatry at the University of Missouri since 1963.

He is a 1937 graduate of Albion College and a 1940 graduate of the University of Michigan medical school. He received a master's degree in psychiatry from the University of Colorado in 1951.

After service in the Army Air Corps as a flight surgeon during World War II, he was in private medical practice for two years at Northville and then served a residency at Fitzsimmons General Hospital in Denver in 1948-51.

Since 1951, Doctor Anderson has held various positions in the Army Medical Corps at Fitzsimmons, West Germany, Walter Reed Research Institute, and the Surgeon General's office.

WSU Medical Students to Help Staff Inner-City Clinic

"This project to help the inner-city indigents is the most exciting thing happening around the medical school in a long time."

Such enthusiastic praise is voiced by Thomas A. Bruce, M.D., Assistant Dean of Medicine at Wayne State University Medical School, when he discusses ambitious summer plans of a group of WSU medical students to open a clinic on the west side of the inner city in mid-July.

Conceived and organized by the students themselves, the clinic will serve the needs of the medically-indigent in the 14th Street and Myrtle area. The clinic will be sponsored by the Detroit chapter of the Student Health Organization. The medical students plan a unique medical clinic which intimately will involve the community in the decision-making and running of the clinic.

The students are in need of money and equipment. Physicians who want to donate either or both can write to Harold Jayne, 1121 Canfield, #1639, Detroit.

Doctor Bruce, who has encouraged and counseled the students, declares, "The significance of the program is that the students are interested in health care programs outside the medical school." Doctor Bruce continued, "This is a manifestation of their concern over social and human values — an important part of their training. These kinds of things are probably worth more than three-quarters of the medical school curriculum."

According to Harold Jayne, second-year medical student who is summer coordinator of the clinic, the clinic will be open in the evenings and on Saturday.

Medical students will work closely with volunteer physicians who will give the ultimate diagnosis and treatment. "As an exercise, junior and senior medical students will do clinical clerkship, histories, and physicals," Mr. Jayne said.

"We want this to be a community-run clinic, with the volunteer help of medical people — a working partnership between the people in the community and professionals in the health field," says Sue Adelman, M.D., a recent graduate of Wayne State University, who has helped organize the program.

"Another reason it is important to involve the community and make it truly their clinic is that many of these people have been taking handouts for years. Their pride is broken," Doctor Adelman continued. "The only way to save their pride is to give them a significant part to play."

The ultimate goal of the clinic, according to Doctor Adelman, "is to be a real family clinic close to the needs of the people, offering diagnosis, treatment, and educational health programs."

"The medical student will be an intermediary between the physician and the patient. He will take the time to make sure that the patient understands his illness and treatment. Without that, we would be wasting our time," she concluded.

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The following materials may be useful to you. Check any item de-ired, cut out the form, and mail it in an envelope to: Michigan State Medical Society, 120 West Saginaw, East Lansing, Michigan 48823.

____AMA Health Education Materials Catalog, list and order blanks for AMA pamphlets and posters of interest to the general public.

____The American Economic Scene at Mid-Cenutry, a collection of socio-economic articles originally published in MICHIGAN MEDICINE and written by Clyde T. Hardwick, Ph.D., MSMS Economics Consultant.

____Medi-labels, medical identification labels to attach to drivers' licenses.

____The Physician, the Clergy and the Whole Man, AMA pamphlet describing the purposes, objectives, and work of the AMA's Department of Medicine and Religion.

____Questions and Answers on the New Freedom Shares (U.S. Savings Notes), a discussion on the new type of U.S. Savings Bonds, compiled by the U.S. Savings Bonds Division in Detroit.

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Coller-Pemberthy Thirlby Event Soon July 27 - 28

All Michigan physicians are invited and urged to attend the Coller-Penberthy-Thirlby Medical Conference in Traverse City on July 27-28.

The meeting in Traverse City at the Park Place Motor Inn permits physicians to combine business with pleasure and enjoy a bit of vacation along with a valuable learning experience.

Joining the seven out-of-state experts participating in the program are a number of notable Michigan physicians.

James W. Hall, M.D., Traverse City, Chairman of the Committee on Arrangements, reports a fine program has been arranged by A. James French, M.D., Professor of Pathology at the University of Michigan, and his associates.

Physicians wishing further information about the Conference may contact Doctor Hall at the Beaumont Building, 1100 Sixth Street, Traverse City 49684.

The June issue of *Michigan Medicine* listed the speakers.

More than 300 team physicians, coaches and trainers participated in the recent MSMS Conference on Medical Aspects of High School Sports, sponsored with the assistance of the U-M Department of Postgraduate Medical Education. W. D. Paul, M.D., front, right, Iowa Hawkeyes physician, was the major speaker. Visiting with him are, left to right, James S. Feurig, M.D., East Lansing, sponsoring committee chairman; T. R. Peterson, M.D., Ann Arbor, and William C. Stewart, Jr., M.D., Kalamazoo. (See article in July issue.)

ADD: IN MEMORIAM

In addition to the deaths reported in the June "In Memoriam," the following news has reached the MSMS office. Details will follow in the July issue of *Michigan Medicine.*

Festus C. Bandy, M.D., Sarasota, Florida, died May 14.

Paul R. Boothby, M.D., Lawrence, died April 17.

Joseph E. Ciprian, M.D., Detroit, died April 22.

Thomas J. Gahagan, M.D., Detroit, died May 5.

Frederik E. Hansen, M.D., Birmingham, died May 18.

Leonard E. Himler, M.D., Ann Arbor, died April 30.

Irwin C. Sweet, M.D., Gladwin, died May 3.

Detroit Wives Elect

DETROIT — Mrs. Stanley J. Roman, Dearborn Heights, is the new president of the Woman's Auxiliary of the Wayne County Medical Society.

MSMS To Host Hudson

AMA President Charles L. Hudson, M.D., and Mrs. Hudson have accepted the invitation of The MSMS Council to attend its midsummer meeting, July 13-15 at the Grand Hotel.

Leader, Executive Secretary of State Registration Board

Luther R. Leader, M.D., Royal Oak, is the new Executive Secretary of the State Board of Registration in Medicine, selected by the Board.

Doctor Leader will complete the unexpired two-year term of E. C. Swanson, M.D., Vassar, who retired in April 1967. New officers will be elected in October of this year.

Long active in professional affairs, Doctor Leader is a past president of the Michigan State Medical Society and the Wayne County Medical Society. He now is chairman of the MSMS Delegation to the AMA. He also has served as president of the Wayne County Medical Society.

Doctor Leader, a surgeon, is a graduate of Northwestern University Medical School.

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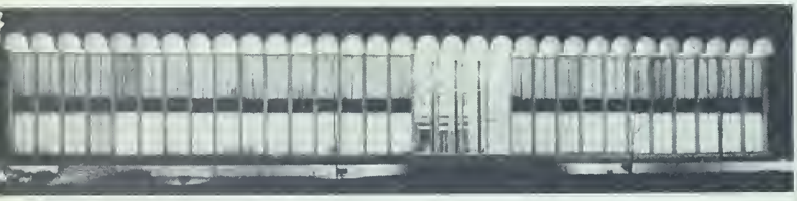

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